

**stryker**

# Power-PRO™ XT Cot

Operations Manual

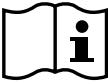
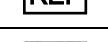
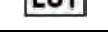
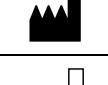
**REF** 6506



EN



# Symbols

	Refer to instruction manual/booklet
	Consult instructions for use
	CE mark
	Authorized representative in the European Community
	European medical device
	General warning
	Caution
	Warning; crushing of hands
	Warning; non-ionizing radiation
	No pushing
	Do not lubricate
	Catalogue number
	Lot (batch) code
	Serial number
	For US Patents see <a href="http://www.stryker.com/patents">www.stryker.com/patents</a>
	Manufacturer
	Date of manufacture
	Importer
	Mass of equipment with safe working load

	Safe working load
	Type B applied part
	Type BF applied part
	Lift here
	Medical Equipment Classified by Underwriters Laboratories Inc. With Respect to Electric Shock, Fire, and Mechanical Hazards Only in Accordance with ANSI/AAMI ES60601-1:2012 and CAN/CSA-C22.2 No. 60601-1:14.
	Direct current
	Alternating current
	Class II electrical equipment: equipment in which protection against electric shock does not rely on basic insulation only, but in which additional safety precautions such as double insulation or reinforced insulation are provided, there being no provision for protective earthing or reliance upon installation conditions.
	Dangerous voltage
	SMRT power system
	Extend
	Retract
IPX0	Non-protected
IPX6	Protection from powerful water jets
	In accordance with European Directive 2012/19/EU on Waste Electrical and Electronic Equipment (WEEE) as amended, this symbol indicates that the product should be collected separately for recycling. Do not dispose of as unsorted municipal waste. Contact local distributor for disposal information. Ensure infected equipment is decontaminated prior to recycling.
	WEEE Directive (2012/96/EC). Contains cadmium.
	The Rechargeable Battery Recycling Corporation (RBRC) is a non-profit, public service organization that promotes the recycling of portable rechargeable batteries. Batteries must be delivered to a battery collection site. Visit the RBRC website ( <a href="http://www.rbrc.org">www.rbrc.org</a> ) to find a nearby collection site or call the phone number shown on the recycling symbol.
	Contains nickel cadmium cells and should be recycled accordingly

	Battery terminal identification (data line, negative, and positive)
KRX 23/44	Ni-Cd cell identification per IEC 61951-1:2003
2300 mAh (1.2A/2h)	Battery capacity, typical charge, and duration
	Cot duty cycle: 16.7% (less than 60 seconds on, more than 300 seconds off)
	This device complies with Part 18 of the FCC rules
	Two person lift
	This way up
	Fragile, handle with care
	Keep dry
	450 lb /205 kg weight capacity
	Stacking limit by number
<b>U.S.A.</b>	English text below this symbol is intended for USA audiences only
TRA Registered No: ER35122/14 Dealer No: DA35173/14	Registered in United Arab Emirates by the Telecommunications Regulatory Authorities
	Product complies with applicable EMC standards in Australia/New Zealand
	Approved by independent communications authority of South Africa
	Box manufacturer's certificate - this packaging box has a minimum test value of 500 lb per sq. in
	Do not clean with bleach
	Shoulder restraint

	Double buckle waist restraint
	Single buckle waist restraint
	Thigh restraint
	Ankle restraint

# Table of Contents

Warning/Caution/Note Definition .....	3
Summary of safety precautions .....	3
Pinch points .....	7
Mechanical stability .....	7
Introduction .....	9
Product description .....	9
Indications for use .....	9
Clinical benefits .....	9
Contraindications .....	10
Expected service life .....	10
Disposal/recycle .....	10
Specifications - Power-PRO .....	10
European REACH .....	12
Standards with required options .....	12
Schnitzler Pediatric Restraint System compatibility .....	13
Specifications - SMRT .....	13
Product illustration - Power-PRO .....	15
Product illustration - SMRT .....	16
Contact information .....	16
Serial number location - Power-PRO .....	17
Serial number location - SMRT .....	17
Setup .....	18
Installation .....	19
Installing the cot fastener .....	19
Installing the in-fastener shut-off .....	19
Selecting the vehicle safety hook .....	20
Vehicle configuration .....	21
Positioning of the vehicle safety hook, front to back .....	22
Positioning of the vehicle safety hook, side to side .....	23
Installing the vehicle safety hook .....	24
Operation .....	26
Setting cot load height with jog function .....	26
Checking the battery power level .....	26
Checking the hour meter and error display .....	27
Operating guidelines .....	27
Proper lifting techniques .....	28
Transferring the patient to the cot .....	28
Rolling the cot with a patient .....	29
Raising or lowering the cot .....	29
Raising, lowering, or releasing the cot with power .....	29
Raising or lowering the cot manually with the manual override .....	30
Expediting load with the high speed retract mode .....	31
Loading or unloading a cot with the Power-LOAD option .....	31
Loading a cot into a vehicle with an antler style cot fastener .....	31
Unloading a cot from a vehicle with an antler style cot fastener .....	32
Positioning operators and helpers .....	34
Raising or lowering the backrest .....	35
Raising or lowering the siderails .....	35
Raising or lowering the siderails (XPS option) .....	36
Extending the retractable head section .....	36
Retracting the retractable head section .....	36
Raising or lowering the footrest .....	37
Raising or lowering the knee Gatch option .....	37
Applying or releasing a wheel lock .....	37
Applying or releasing the Steer-Lock option .....	38

Applying or releasing the kickstand option for dialysis scale.....	38
Securing the patient with the G-rated restraint straps .....	38
Attaching the shoulder, thigh, or ankle restraints .....	40
Attaching the waist restraints.....	41
Adjusting restraint straps.....	41
Securing a patient with the X-restraint/XPR restraint straps .....	42
Attaching the X-restraint/XPR shoulder restraints.....	43
Attaching the X-restraint/XPR waist restraints.....	44
Attaching the X-restraint/XPR thigh restraints .....	44
Attaching the X-restraint/XPR ankle restraints .....	44
Attaching the X-restraint/XPR ankle restraints .....	45
Adding a restraint strap extension .....	46
Securing the patient with the Pedi-Mate® infant restraint system .....	46
Securing the child restraint with the X-restraint package.....	46
Attaching the defibrillator platform .....	48
Hanging equipment from the equipment hook .....	51
Attaching the head extension with pillow .....	51
Positioning the two-stage IV pole .....	51
Positioning the three-stage IV pole option .....	52
Attaching an oxygen bottle to the oxygen bottle holder .....	53
Attaching an oxygen bottle to the retractable head section oxygen bottle holder.....	53
Attaching the base storage net option.....	54
Attaching the backrest storage pouch .....	54
Attaching the head end storage flat option.....	55
Attaching the mattress.....	56
Inserting a SMRT Pak .....	56
Removing a SMRT Pak from the cot.....	56
Storing the battery.....	57
Charging the SMRT Pak.....	57
Checking the SMRT Pak power level with the SMRT charger .....	58
Electrical power installation requirements .....	59
Installing the SMRT charger.....	59
Installing the mounting bracket option.....	59
Attaching the charger onto the mounting bracket option .....	60
Powering the charger .....	61
Disconnecting the charger .....	62
Accessories and parts .....	63
Cleaning and disinfecting with wipes.....	65
Cleaning and disinfecting the XPR restraint straps .....	66
Cleaning.....	67
Suggested cleaners .....	67
Cleaning the charger .....	68
Cleaning the battery .....	68
Preventive maintenance .....	69
Lubrication .....	69
Regular inspection and adjustments .....	69
Every month or two hours .....	69
Every three months or six hours.....	70
Every six months or 12 hours .....	71
Every 12 months or 24 hours.....	71
Foot end fastener part replacement schedule .....	72
Wireless notifications .....	73
EMC information .....	74

# 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 product 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** - Provides special information to make maintenance easier or important instructions clearer.

## Summary of safety precautions

Always read and strictly follow the warnings and cautions listed on this page. Service only by qualified personnel.

---

## **WARNING**

- Always keep your hands clear of the red safety bar pivots when you load, unload, or change the height position of the cot.
- Always use both hands when you transport the cot.
- Always place the cot in the lowest height position when on a plane steeper than five degrees.
- **Power-PRO** with the **Power-LOAD** compatibility option operates primarily at these frequencies: 70 - 85 kHz for inductive charging and 13.56 MHz $\pm$ 7 kHz, Amplitude Modulated (OOK), ERP: -82.37 dBm. The inductive charging can operate between these frequencies: 70 - 125 kHz. Other equipment may interfere with the **Power-LOAD** system, even if that other equipment complies with CISPR emission requirements.
- Always install the in-fastener shut-off system in any emergency vehicle that will be used with this cot and an antler style cot fastener.
- Always install the cot fastener by qualified personnel only. Improper installation could result in injury to the patient or operator.
- Always make sure that all cots meet the installation specifications for the Stryker cot fastener system.
- Always adjust the rail clamp assembly to match the cot retaining post position for the cot manufacturer and model number.
- Always position the in-fastener shut-off before you place the cot into service.
- Do not attempt to operate the cot when it is loaded into a cot fastener.
- Always use the in-fastener shut-off to disable the electronic functionality only. Do not use the in-fastener shut-off for any other purpose.
- Always adjust the mounting location to maintain the proper position of the vehicle safety hook face when you replace an existing vehicle safety hook with a new style.
- Always have a certified mechanic, familiar with ambulance vehicle construction, install the vehicle safety hook to avoid injury to the patient or operator.
- Always consult the vehicle manufacturer before vehicle safety hook installation. Make sure that the installation of the vehicle safety hook does not damage or interfere with the brake lines, oxygen lines, fuel lines, fuel tank, or electrical wiring of the vehicle.
- Do not modify the cot or the vehicle safety hook. If the cot safety bar does not connect with the vehicle safety hook in any of these positions (left, center, or right), modify the vehicle.
- Always make sure that the cot safety bar connects with the vehicle safety hook every time before vehicle safety hook installation.
- Always make sure that the cot safety bar connects with the vehicle safety hook before you remove the cot from the vehicle patient compartment to avoid the risk of injury.
- Always use screws that are long enough to go through the vehicle patient compartment floor, washer, and nut, with at least two full threads in the nut. The socket head cap screw length depends on the thickness of the vehicle floor.

- Do not remove the battery when the cot is active.
- Always operate the product only when all persons are clear of the mechanisms. Entanglement in powered product mechanisms can cause serious injury.
- Always inspect **SMRT** Paks for damage before every use.
- Do not allow untrained assistants to assist in the operation of the product.
- Always follow proper hand placement on hand grips. Keep all hands clear of the red safety bar pivots when you load or unload the cot or change cot height position.
- Do not ride on the base of the cot.
- Do not transport the cot sideways to avoid the risk of tipping. Always transport the cot in a lowered position, head end or foot end first to minimize the risk of tipping.
- Always keep hands, fingers, and feet away from moving parts. Use caution when placing your hands and feet near the base tubes while you raise or lower the cot.
- Always conduct patient monitoring when the cot is idle. If you hydraulically raise or lower the product you may temporarily affect electronic patient monitoring equipment.
- Always use all restraint straps to secure the patient on the product. An unrestrained patient may fall from the product and be injured.
- Do not leave a patient unattended. Hold the product while a patient is on the product.
- Do not apply a wheel lock when a patient is on the product or when you move the product to avoid the risk of tipping.
- Do not use siderails as a patient restraint device.
- Always transport the cot at a lower height to reduce the risk of a cot tip. If possible, obtain additional assistance or take an alternate route.
- Always avoid high obstacles, such as curbing, steps, or rough terrain to avoid the risk of the product tipping over.
- Always keep hands, fingers, and feet away from moving parts. Use caution when placing your hands and feet near the base tubes while you raise or lower the cot.
- Do not use the jog function to jog past the set cot load height after the cot safety bar connects with the vehicle safety hook.
- Always use two operators to raise or lower the cot with a patient.
- Always use **Power-LOAD** with the 6085/6086 **Performance-PRO** XT, 6500/6506 **Power-PRO** XT, and 6510/6516 **Power-PRO** IT cots with the **Power-LOAD** option only. In certain situations, you can use **Power-LOAD** as a standard antler for most X-frame cots, but a rail clamp assembly is required for all cots without the **Power-LOAD** option.
- Always make sure that you use a **Power-PRO** date of manufacture cot with the Stryker Model 6390 **Power-LOAD** system to avoid the risk of injury.
- Always support the load of the patient, cot, and accessories after the weight is off of the ground.
- Always use two operators when a cot is occupied.
- Do not load the cot into a vehicle with the head section retracted when using a cot fastener. The cot may tip or not connect with the cot fastener.
- Always use the powered method to load an unoccupied cot with one operator. Do not use the manual method to load an unoccupied cot with one operator.
- Always make sure that two operators are present when a cot is occupied.
- Do not pull or lift on the cot safety bar when you unload the cot.
- Always set the cot transfer wheels safely on the ground when you unload the cot from the vehicle patient compartment to avoid the risk of product damage.
- Do not press the extend (+) button until the safety bar connects with the vehicle safety hook.
- Always follow proper hand placement on hand grips. Keep all hands clear of the red safety bar pivots when you load, unload, or change the cot height position.
- Always lock the head section into place before you operate the cot.
- Do not install or apply a wheel lock on a product with worn wheels that are less than 6 in. diameter.
- Do not leave a patient or occupant unattended. Hold the product while a patient or occupant is on the product.
- Always use two operators when using the kickstand.
- Always center the patient weight on the cot before you use the kickstand.
- Always apply the kickstand with your foot only.
- Always lower the cot height before you apply the kickstand for increased stability.
- Do not apply the kickstand during transport. Keep the kickstand in the retracted position.

- Do not use the kickstand as a brake.
- Do not apply the kickstand on a sloped surface.
- Do not attach restraint straps to the base tubes or cross tubes.
- Always form an X with the waist restraint strap and the shoulder restraint strap.
- Always locate the buckle away from obstructions or accessories on the cot to avoid the risk of accidental release of **Pedi-Mate®** infant restraint system and injury to the infant.
- Do not attach the defibrillator platform on a Model 6086 **Performance-PRO XT** cot with the **Power-LOAD** option to avoid the risk of a cot tip.
- Do not use the oxygen bottle holder to hold an oxygen bottle holder when the transport vehicle is in motion. Always place the oxygen bottle holder in an appropriate storage location when the transport vehicle is in motion.
- Always inspect the straps and clips for wear between use. Replace the strap if it no longer holds the oxygen bottle.
- Do not pinch your fingers between the Fowler bracket and the oxygen bottle if your cot is equipped with the retractable head section oxygen bottle holder option.
- Do not allow the head end storage flat (if equipped) to interfere with the operation of the retractable head section, safety bar, or vehicle safety hook.
- Do not attempt to open the battery pack for any reason, to avoid the risk of electric shock. If the battery pack case is cracked or damaged, do not insert it into the charger. Return damaged battery packs to a service center for recycling.
- Always avoid direct contact with a wet battery or battery enclosures. Contact may cause injury to the patient or operator.
- Do not insert a cracked or damaged **SMRT** Pak into the **SMRT** charger. Return damaged **SMRT** Paks to a service center for recycling.
- Always have a certified mechanic, familiar with ambulance vehicle construction, install the mounting bracket option and the **SMRT** charger.
- Always mount the **SMRT** charger to the mounting bracket option in an enclosed cabinet and out of patient reach during transport to comply with established crash test standards.
- Always make sure that the mounting bracket option is securely attached to the surface.
- Always use any appropriate personal protective equipment while power washing to avoid inhaling contagion. Power washing equipment may aerate contamination.
- Always wear insulated rubber gloves, in addition to personal protective equipment, when cleaning the **SMRT** Pak to reduce the risk of injury.
- Always disconnect the **SMRT** charger from the wall outlet before cleaning to avoid the risk of electrical hazards.
- Do not spray fluid directly onto the **SMRT** charger.
- Do not power wash the **SMRT** charger.
- Do not use solvents, lubricants, or other chemicals to clean the **SMRT** charger unless otherwise directed.
- Do not immerse the **SMRT** charger in water or allow water to collect on top of the **SMRT** charger to avoid the risk of electric shock.
- Always use only non-conductive materials to wipe the **SMRT** Pak.
- Always avoid excessive water exposure to the **SMRT** Pak terminals.
- Always refer to the disinfectant's Material Safety Data Sheet (MSDS) to verify the pH range. Disinfectants with pH levels higher than 10.5 may cause the **SMRT** Pak housing material to crack.
- Do not directly handle or make contact with the **SMRT** Pak terminals while cleaning to avoid the risk of injury.
- Do not immerse the **SMRT** Pak in liquid to reduce the risk of electric shock.
- Do not use solvents, lubricants, or other chemicals to clean the **SMRT** Pak unless otherwise directed.
- Always relieve pressure before you disconnect hydraulic or other lines. Escaping fluid under pressure can penetrate the skin and cause serious injury. Tighten all connections before you apply pressure. If an accident occurs, see a doctor immediately.
- Do not use bare hands to check for hydraulic leaks.

---

## CAUTION

- Improper usage of the product can cause injury to the patient or operator. Operate the product only as described in this manual.
- Do not modify the product or any components of the product. Modifying the product can cause unpredictable operation resulting in injury to patient or operator. Modifying the product also voids its warranty.

- This equipment has been tested and found to comply with the limits for a Class A digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial environment. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instruction manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area is likely to cause harmful interference in which case the user will be required to correct the interference at their expense.
- Do not use the product with incompatible restraints.
- Always set the cot load height before you place the cot into service.
- Always charge the battery before you place the product into service. An uncharged or depleted battery may cause poor product performance.
- Always clear any obstacles that may interfere and cause injury to the operator or patient before operating the product.
- Do not sit or stand on the siderails (XPS option).
- Do not use the siderails (XPS option) as a patient transfer device or surface (for example, to slide a patient from the cot to another surface).
- Do not position patients with full weight on the siderails (XPS option).
- Do not use the siderails (XPS option) as a push/pull device or to steer the product.
- Do not entangle the restraint straps in the base frame when you raise or lower the cot.
- Always secure the defibrillator platform to the product when you use the defibrillator platform.
- Always use and adjust the straps that are provided with the defibrillator platform to secure the defibrillator.
- Always change the attachment location or adjust the straps for your specific defibrillator size or shape.
- Do not load the defibrillator platform above the safe working load of 30 lb (13.6 kg).
- Do not load the equipment hook above the safe working load of 35 lb (15.8 kg).
- Always remove all accessories or equipment from the equipment hook when in the vehicle.
- Do not load the IV pole above the safe working load of 25 lb (11.3 kg).
- Do not load the oxygen bottle holder above the safe working load of 15 lb (6.8 kg).
- Do not use two oxygen bottle holders at the same time.
- Do not load the base storage net above the safe working load of 20 lb (9 kg).
- Always be careful when you retract the base to avoid damaging items that are stored in the base storage net.
- Do not load the backrest storage pouch above the safe working load of 20 lb (9 kg).
- Do not allow the storage pouch to interfere with the operation of the retractable head section.
- Do not load the head end storage flat above the safe working load of 40 lb (18 kg).
- Do not store items under the mattress. Items under the mattress may interfere with product operation.
- Always remove the battery if the cot is not going to be used for an extended period of time (more than 24 hours).
- Always place the electrical **SMRT** charger power cord where it will not be stepped on, tripped over, or otherwise subjected to damage or stress.
- Do not touch the **SMRT** Pak receptacle terminals with metal objects.
- Always grasp and pull the plug, not the cord, when you disconnect the **SMRT** charger to avoid the risk of damage to the electrical plug and cord.
- Do not apply lubricants to the surfaces of the restraints.
- Do not steam clean or ultrasonically clean the product.
- Do not exceed 180 °F (82 °C) as the maximum water temperature.
- Do not exceed 1500 psi (103.4 bar) as the maximum water pressure. If you use a hand held wand to wash the product, keep the pressure nozzle at a minimum of 24 in. (61 cm) from the product.
- Always allow to air dry.
- Always remove the battery before you wash the cot.
- Do not clean, service, or perform maintenance while the product is in use.
- Do not steam clean or ultrasonically clean the **SMRT** Pak.
- Do not exceed 240 °F (115 °C) as the maximum air dry temperature (cart washers).
- Always use authorized parts to avoid the risk of product damage.
- Always check hoses and lines regularly to avoid damage to the cot. Check and tighten loose connections. Hydraulic lines, hoses, and connections can fail or loosen due to physical damage, kinks, age, and environment exposure.
- Do not tip the cot onto its load wheels and actuate the product as this will allow air to enter the hydraulic system.

- Do not lubricate the bearings in the X-frame as it will degrade the performance of the cot and may void its warranty.
- The use of accessories, transducers, and cables, other than those specified or provided by the manufacturer, could result in increased electromagnetic emissions or decreased electromagnetic immunity and result in improper operation.
- The emissions characteristics of this equipment make it suitable for use in industrial areas and hospitals (CISPR 11 class A). If it is used in a residential environment, for which CISPR 11 class B is normally required, this equipment might not offer adequate protection to radio frequency communication services. The user might need to take mitigation measures, such as relocating or reorienting the equipment.
- Portable RF communications equipment, including peripherals such as antenna cables and external antennas, should be used no closer than 12 inches (30 cm) to any part of **Power-PRO** and **SMRT** charger, including cables specified by the manufacturer.
- Avoid stacking or placing other equipment adjacent to **Power-PRO** and **SMRT** charger to prevent improper operation of the products. If such use is necessary, carefully observe **Power-PRO** and **SMRT** charger and the other equipment to make sure that they are operating properly.

## Pinch points

**WARNING** - Always keep your hands clear of the red safety bar pivots when you load, unload, or change the height position of the cot.

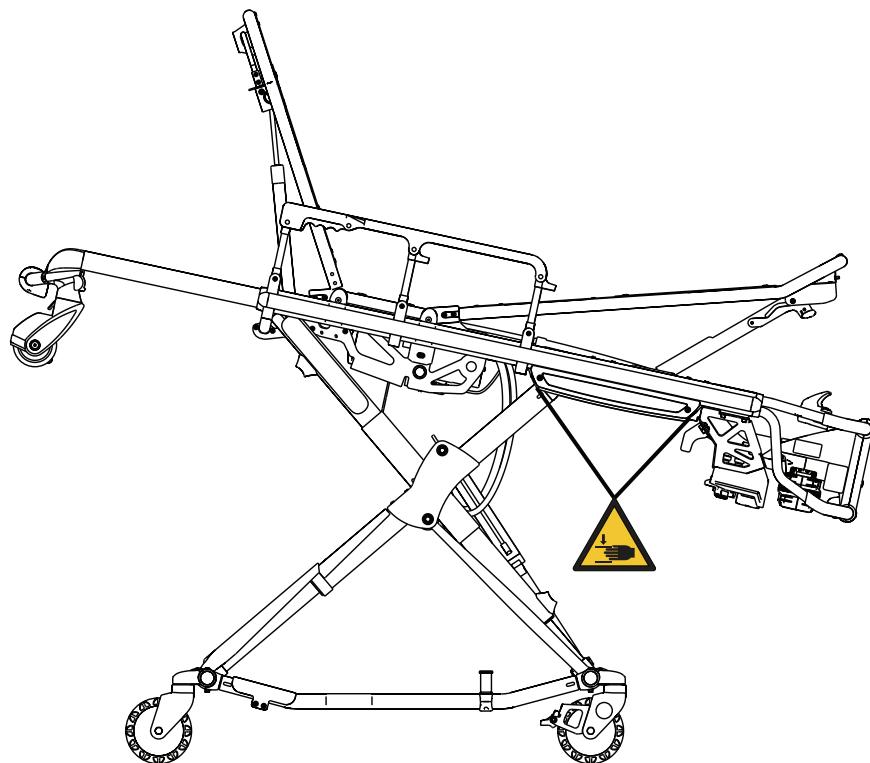
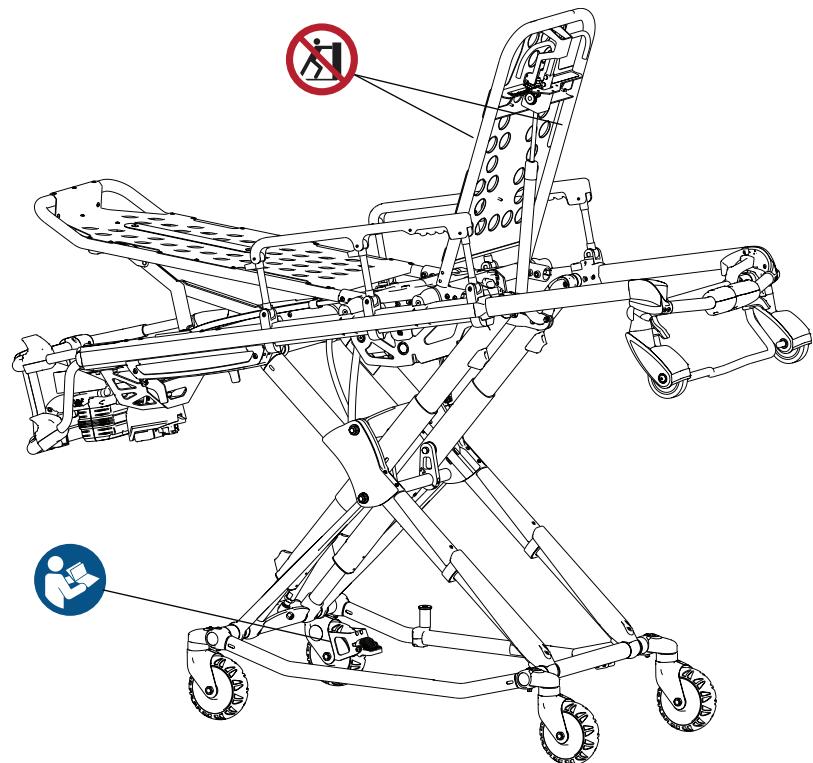


Figure 1 – Pinch points

## Mechanical stability

### **WARNING**

- Always use both hands when you transport the cot.
- Always place the cot in the lowest height position when on a plane steeper than five degrees.



**Figure 2 – Mechanical stability**

**Note** - Do not use the defibrillator option and the foot end oxygen bottle holder option at the same time.

# Introduction

This manual assists you with the operation or maintenance of your Stryker product. Read this manual before operating or maintaining this product. Set methods and procedures to educate and train your staff on the safe operation or maintenance of this product.

## CAUTION

- Improper usage of the product can cause injury to the patient or operator. Operate the product only as described in this manual.
- Do not modify the product or any components of the product. Modifying the product can cause unpredictable operation resulting in injury to patient or operator. Modifying the product also voids its warranty.

## Note

- This manual is a permanent part of the product and should remain with the product even if the product is sold.
- Stryker continually seeks advancements in product design and quality. This manual contains the most current product information available at the time of printing. There may be minor discrepancies between your product and this manual. If you have any questions, contact Stryker Customer Service or Technical Support at 1-800-327-0770.

## Product description

The Stryker Model 6506 **Power-PRO® XT** cot is a powered ambulance cot that consists of a platform mounted on a wheeled X-frame designed to support and transport a maximum weight of 700 lb (318 kg) in pre-hospital and hospital environments.

The device is collapsible for use in emergency vehicles and has an adjustable load height feature to allow the device to be set to different ambulance deck heights for proper body mechanics during loading and unloading. The NiCd battery-powered hydraulic lift system allows operators to raise and lower the cot using the powered controls, while duplicate foot end controls on the upper and lower lift bars accommodate different operator positions or sizes. The cot is equipped with a manual back-up release handle to allow the operation of cot functions in the event of power loss. The device is equipped with a retractable head section for 360-degree mobility in any height position, siderails, patient securement straps, an adjustable pneumatic backrest, and various optional accessories that assist with the transport of a patient. Maximum patient comfort is attainable with the three different litter positions of shock, flat leg, and optional knee Gatch positioning.

The **SMRT™** power system consists of a **SMRT** charger and a **SMRT** Pak. The **SMRT** Pak powers the hydraulic lift system of the Stryker powered ambulance cots.

## Indications for use

The Stryker **Power-PRO XT** is a powered wheeled stretcher, which is intended to support and transport the entire body of a traumatized, ambulatory, or non-ambulatory human patient (includes infants and adults).

The battery-powered hydraulic lift system is intended to help reduce the effort required by the operator to raise and lower the cot. The device is designed to support patients in a supine (horizontal) or sitting position and facilitate the transportation of associated medical equipment (such as oxygen bottles, monitors, or pumps) in emergency or transport vehicles. This ambulance cot is intended to be used in pre-hospital and hospital environments, and in emergency and non-emergency applications. It is rated to a maximum capacity of 700 lb (318 kg) (sum of the patient, mattress, and accessory weight) and the intended operators of the device are trained professionals including emergency medical service and medical care center personnel, as well as medical first responders.

**Power-PRO XT** is not intended for extended stay or use as a hospital bed or in devices that modify air pressure, such as hyperbaric chambers.

## Clinical benefits

Cot: patient transport

Fastener: support cot for transport

## Contraindications

None known.

## Expected service life

Power-PRO has a seven year expected service life under normal use conditions and with appropriate periodic maintenance.

The SMRT charger has a seven year expected service life under normal use conditions and with appropriate periodic maintenance.

The SMRT Pak battery has a two year expected service life under normal use conditions.

## Disposal/recycle

Always follow the current local recommendations and/or regulations governing environmental protection and the risks associated with recycling or disposing of the equipment at the end of its useful life.

## Specifications - Power-PRO

	Safe working load <b>Note</b> - Safe working load indicates the sum of the cot, patient, mattress, and accessory weight.	700 lb	318 kg
Maximum unassisted lift capacity <sup>1</sup>	500 lb	227 kg	
Backrest articulation/shock position (standard Fowler - 6506-012-003)	0° to 73°/+15°		
Backrest articulation/shock position (1865 Fowler option - 6506-012-004)	0° to 75°/+15°		
Backrest articulation/shock position (6506-700-013)	6° to 73°/+15°		
Overall length/minimum length/width	81 in./63 in./23 in.	206 cm/160 cm/58 cm	
Height <sup>2</sup>	Adjustable from 14 in. to 41.5 in.	Adjustable from 36 cm to 105 cm	
Weight <sup>3</sup>	125 lb	57 kg	
Caster diameter/width	6 in./2 in.	15 cm/5 cm	
Minimum operators required for loading/ unloading an occupied cot	2		
Minimum operators required for loading/ unloading an unoccupied cot	1		
Recommended fastener systems	Model 6370 or 6377 Floor mount type, Model 6371 Wall mount type, Model 6390 <b>Power-LOAD</b> , Model 6392 <b>Performance-LOAD</b>		

Recommended loading height <sup>4</sup>	Up to 36 in.	Up to 91 cm
Recommended working height (excluding mattress)	15.75 in.	40 cm
Hydraulic oil	Stryker part number 6500-001-293	
Power system		
Battery	24 VDC NiCd - <b>SMRT</b> power system	
Charger	100-240 VAC 1.20 A, 50/60 Hz or 12 VAC 4.16 A - <b>SMRT</b> power system	
Cot duty cycle	16.7% (less than 60 seconds on, more than 300 seconds off)	
Standards (cots and chargers)	ANSI/AAMI ES60601-1:2012, CAN/CSA-C22.2 No. 60601-1:14, KKK-A-1822 For standards that require specific options, see <i>Standards with required options</i> (page 12).	

<sup>1</sup> Cot loads over 300 lb (136 kg) may require additional assistance to meet the set cot load height.

<sup>2</sup> Height measured from bottom of mattress at seat section to ground level.

<sup>3</sup> Cot is weighed with one battery and without mattress and restraints.

<sup>4</sup> Set the cot height to any ambulance deck height that ranges from 26 in. to 36 in. (66 cm to 91 cm).

Stryker reserves the right to change specifications without notice.

**Power-PRO XT** is designed to conform to the Federal Specification for the Star-of-Life Ambulance (KKK-A-1822).

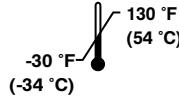
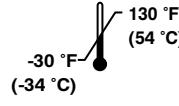
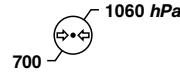
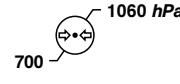
**Power-PRO XT** is designed to be compatible with some competitive cot fastener systems.

The yellow and black color scheme is a proprietary trademark of Stryker Corporation.

Hereby, Stryker declares that the radio equipment type short range device is in compliance with Directive 2014/53/EU. The full text of the EU declaration of conformity is available at the following internet address: <http://techweb.med.strykercorp.com/EMS/EU%20Declaration%20of%20Conformity/index.html>.

Labels may be unreadable from a viewing distance greater than 12 inches.

**WARNING - Power-PRO** with the **Power-LOAD** compatibility option operates primarily at these frequencies: 70 - 85 kHz for inductive charging and 13.56 MHz±7 kHz, Amplitude Modulated (OOK), ERP: -82.37 dBm. The inductive charging can operate between these frequencies: 70 - 125 kHz. Other equipment may interfere with the **Power-LOAD** system, even if that other equipment complies with CISPR emission requirements.

Environmental conditions	Operation	Storage and transportation
Temperature		
Relative humidity		
Atmospheric pressure		

**CAUTION** - This equipment has been tested and found to comply with the limits for a Class A digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial environment. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instruction manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area is likely to cause harmful interference in which case the user will be required to correct the interference at their expense.

## European REACH

In accordance with the European REACH regulation and other environmental regulatory requirements, the components that contain declarable substances are listed.

Description	Number	Substance of very high concern (SVHC) chemical name
Cot comm board	6500-002-100	Octamethylcyclotetrasiloxane
Mattress, knee Gatch bolster	6500-002-150	(2H-benzotriazol2-yl)-4, 6-di-tert-pentylphenol
Mattress, knee Gatch bolster, grey	6506-002-150	(2H-benzotriazol2-yl)-4, 6-di-tert-pentylphenol
Mattress, knee Gatch bolster, XPS	6500-003-130	(2H-benzotriazol2-yl)-4, 6-di-tert-pentylphenol
Mattress, knee Gatch bolster, grey	6506-003-130	(2H-benzotriazol2-yl)-4, 6-di-tert-pentylphenol
Ni-CAD battery cell	6500-101-129	Cadmium, cadmium hydroxide
Pole assembly, two-stage, cot IV	6070-210-070	Lead
Pole assembly, three-stage, cot IV	6070-215-070	Lead

## Standards with required options

To be compliant with the standards, you must install the following required options on your cot.

**Note** - Compatible cot is loaded into **Power-LOAD** in powered mode for crash testing.

Standard	Option selection		
	Restraint package	Mattress	Option
SAE J3027 crash-test standards with the use of a crash-rated fastener	XPR restraint package (650600030010) or X-restraint package (6500-001-430)	Knee Gatch bolster mattress (6500-002-150/6506-002-150) or XPS mattress (6500-003-130/6506-003-130) (depending on cot siderail)	
AS/NZS-4535 crash-test standards with the use of a crash-rated fastener	X-restraint package (6500-001-430)	Knee Gatch bolster mattress (6500-002-150/6506-002-150) or XPS mattress (6500-003-130/6506-003-130) (depending on cot siderail)	

Standard	Option selection		
	Restraint package	Mattress	Option
BS EN 1789:2007+A2:2014 crash-test standards with the use of a crash-rated fastener	XPR restraint package (650600030010), X-restraint package (6500-001-430), or G-rated restraint package (6500-002-030)	Knee Gatch bolster mattress (6500-002-150/6506-002-150) or XPS mattress (6500-003-130/6506-003-130) (depending on cot siderail)	
BS EN 1865-3:2012 +A1:2015			XPS option (6506-040-000)
BS EN 1865-2:2010 +A1:2015			1865 Fowler option (6506-012-004)

The Britax Meridian SICT Series No. 7200/A/2010 Convertible Child Restraint with the X-restraint package (6500-001-430) has been dynamically crash tested with a 10 kg crash dummy to 18.2 G forward and 10 G sideward per AS/NZS-4535: 1999 crash-test standards.

## Schnitzler Pediatric Restraint System compatibility

**CAUTION** - Do not use the product with incompatible restraints.

<b>XPS mattress (6500-003-130 or 6506-003-130)</b>	<b>Schnitzler Pediatric Restraint System (0058-384-000) with serial number less than 720 XPSNPR-2123</b>	<b>Schnitzler Pediatric Restraint System (0058-384-000) with serial number equal to or greater than 720 XPSNPR-2123</b>
Mattress with lot code less than 18001001	Compatible	Compatible
Mattress with lot code equal to or greater than 18001001	Not compatible	Compatible

The Schnitzler Pediatric Restraint System (0058-385-000) is compatible for use with the standard mattress on Model 6100 M-1 Roll-In System, Model 6506 Power-PRO XT Cot, and Model 6550 Power-PRO TL Cot.

## Specifications - SMRT

	SMRT charger	SMRT Pak	AC power supply
Electrical input	13.9 VDC 4.16 A	Not applicable	100-240 VAC 1-2 A 50/60 Hz
Electrical output	Open circuit 40 VDC 1.20 A	24 VDC NiCd	12 VDC 4-6 A
Height	2.375 in. (60.325 mm)	3.25 in. (82.55 mm)	Varies
Width	5.125 in. (130.175 mm)	4 in. (101.6 mm)	Varies
Length	7 in. (177.8 mm)	5.75 in. (146.05 mm)	Varies
Weight	1.3 lb (.59 kg)	3.8 lb (1.7 kg)	Varies
Enclosure protection	IPX0	IPX6	IPX0

	SMRT charger	SMRT Pak	AC power supply
Equipment type	Not applicable	Not applicable	Class II
Approvals	ANSI/AAMI ES 60601-1: 2012, CAN/CSA-C22.2 No. 60601-1:14	Not applicable	Not applicable

Environmental conditions	Operation	Charging	Storage and transportation
Temperature			
Relative			
Atmospheric pressure			

Specifications are approximate and may vary from unit to unit or as a result of power supply fluctuations.

Stryker reserves the right to change specifications without notice.

## Product illustration - Power-PRO

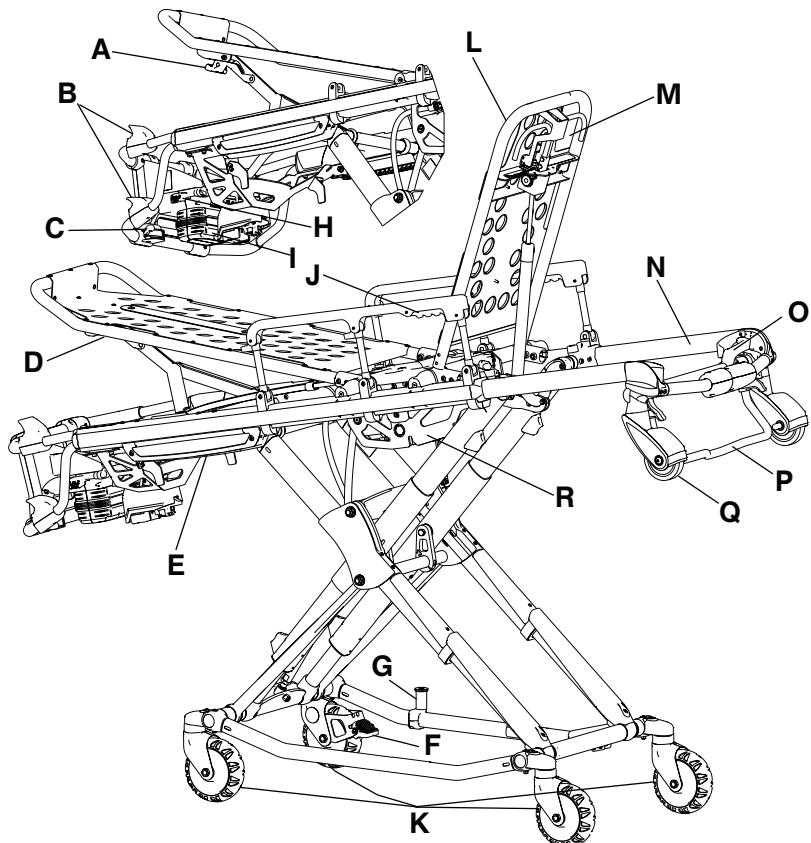


Figure 3 – Power-PRO XT

A	Footrest release handle	J	Siderail release handle
B	Height adjustment switches	K	Transport wheels
C	Manual back-up release handle	L	Backrest
D	Footrest	M	Backrest adjustment handle
E	Height sensor housing (on other side)	N	Retractable head section
F	Wheel lock	O	Head section release handle
G	Cot retaining post	P	Safety bar
H	Battery release	Q	Load wheel
I	Battery	R	Hydraulic unit

## Product illustration - SMRT

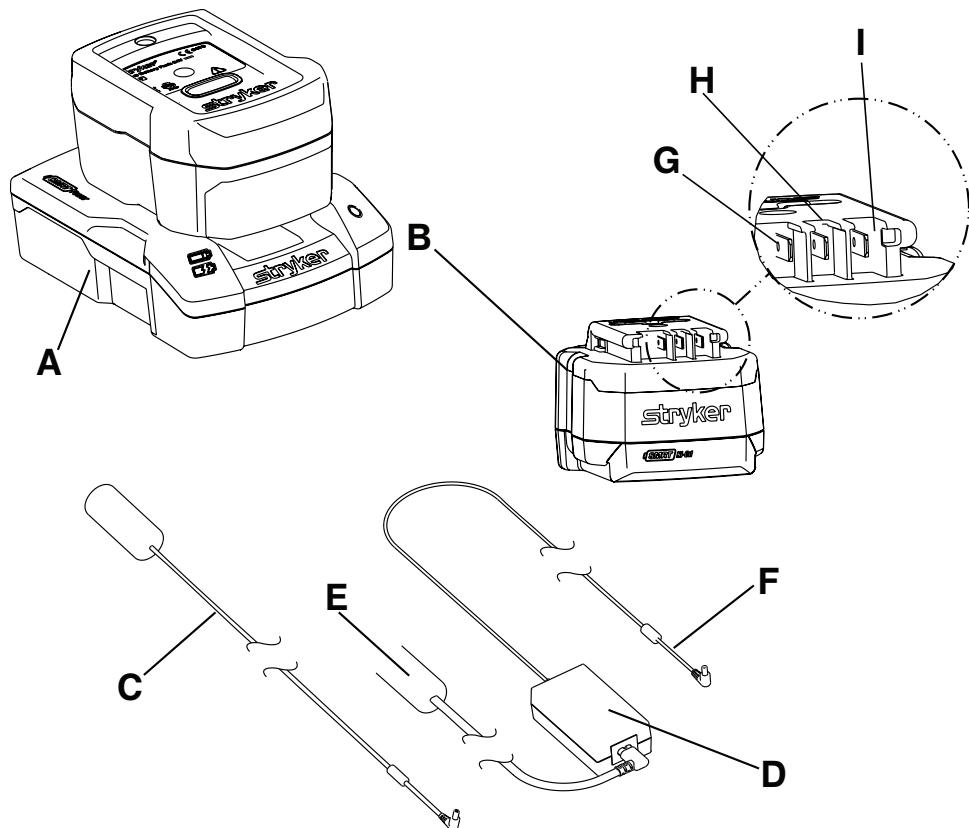


Figure 4 – SMRT power system

A	SMRT charger	F	Output cord
B	SMRT Pak	G	Data
C	DC cable	H	Power (-)
D	AC power supply	I	Power (+)
E	AC power cord		

## Contact information

Contact Stryker Customer Service or Technical Support at: 1-800-327-0770.

Stryker Medical  
3800 E. Centre Avenue  
Portage, MI 49002  
USA

**Note** - The user and/or the patient should report any serious product-related incident to both the manufacturer and the Competent authority of the European Member State where the user and/or patient is established.

To view your operations or maintenance manual online, see <https://techweb.stryker.com/>.

Have the serial number (A) of your Stryker product available when calling Stryker Customer Service or Technical Support. Include the serial number in all written communication.

## Serial number location - Power-PRO

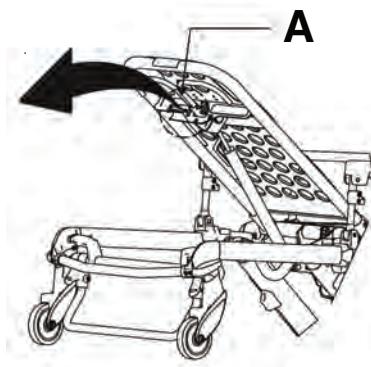


Figure 5 – Serial number location

## Serial number location - SMRT

The serial number for the **SMRT** charger is located on the bottom of the unit. The lot number for the **SMRT** Pak is located on the top of the **SMRT** Pak above the red release button.

## Setup

During setup, unpack the cartons and check all items for proper operation. Make sure that the product operates before you place it into service.

---

**WARNING** - Always install the in-fastener shut-off system in any emergency vehicle that will be used with this cot and an antler style cot fastener.

---

Remove all the shipping and packaging materials from the product before use.

The vehicle patient compartment where the product will be used must have a:

- Smooth rear edge for product loading
- Level floor large enough for the folded product
- Stryker cot fastener system
- Space to install the vehicle safety hook
- In fastener shut-off module installed, if using an antler style cot fastener

**Note** - Loose items or debris on the vehicle patient compartment floor can interfere with the operation of the vehicle safety hook and product fastener. Keep the vehicle patient compartment floor clear.

Unpack the **SMRT** Paks and **SMRT** charger. Charge the **SMRT** Pak before use.

When necessary, modify the vehicle to fit the cot. Do not modify the cot.

# Installation

## Installing the cot fastener

The Stryker cot fastener systems are compatible only with cots that conform to the installation specifications.

---

### **WARNING**

- Always install the cot fastener by qualified personnel only. Improper installation could result in injury to the patient or operator.
- Always make sure that all cots meet the installation specifications for the Stryker cot fastener system.
- Always adjust the rail clamp assembly to match the cot retaining post position for the cot manufacturer and model number.

---

These instructions are intended for cots with antler style cot fastener systems. For crash-rated cot fasteners, see the appropriate Operations Manual for installation instructions.

## Installing the in-fastener shut-off

These instructions are intended for cots with antler style cot fastener systems. For crash-rated cot fasteners, see the appropriate Operations Manual for installation instructions.

---

### **WARNING**

- Always position the in-fastener shut-off before you place the cot into service.
- Do not attempt to operate the cot when it is loaded into a cot fastener.
- Always use the in-fastener shut-off to disable the electronic functionality only. Do not use the in-fastener shut-off for any other purpose.
- Always install the in-fastener shut-off system in any emergency vehicle that will be used with this cot and an antler style cot fastener.

---

The cot and antler style cot fastener system have an integrated in-fastener shut-off function that disables the cot motor when you secure the cot into the cot fastener. Tighten the bolts to secure the fastener before you install the shut-off bracket. Install the shut-off bracket onto the rail clamp assembly before you place the cot into service.

1. Raise the base and push the cot into the vehicle patient compartment by following the appropriate loading instructions.
2. Secure the extended head section of the cot into the cot fastener antler.
3. Secure the cot post into the fastener rail clamp.
4. Adjust the shut-off bracket along the rail clamp until the diamond (A) on the sensor housing is lined up with the pop rivet head (B).

**Note** - Align the diamond (A) on the sensor housing cover with the pop rivet head (B) on the in-ambulance shut-off.

5. Using a T27 Torx driver, securely fasten the bolts to attach the shut-off bracket to the rail clamp assembly.
6. Press the retract (-) button to make sure that the motor does not turn on while the cot is in the fastener. The cot battery LED indicator will still illuminate. If the motor turns on, readjust the shut-off bracket.

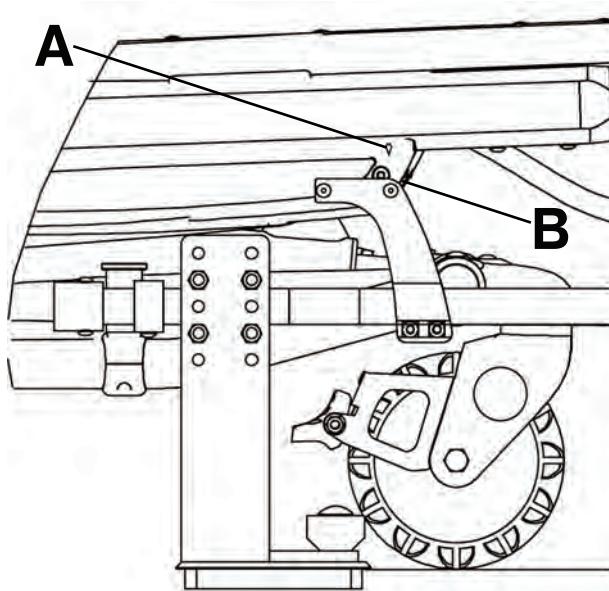


Figure 6 – Adjust shut-off bracket

## Selecting the vehicle safety hook

The vehicle safety hook is a device that ships with the cot. The cot safety bar and vehicle safety hook keep the cot from being accidentally removed from the vehicle and provide increased operator assurance and confidence when loading and unloading.

---

**WARNING** - Always adjust the mounting location to maintain the proper position of the vehicle safety hook face when you replace an existing vehicle safety hook with a new style.

---

**Note** - These instructions are intended for cots with antler style cot fastener systems. For crash-rated cot fasteners, see the appropriate Operations Manual for installation instructions. Crash-rated cot fasteners are shipped and installed with a vehicle safety hook, so no additional hook is needed.

The vehicle safety hook was designed for compatibility and proper operation when loading and unloading the cot from a vehicle that is compliant with Federal Regulation KKK-A-1822. Stryker offers three different types of vehicle safety hooks that are ordered and shipped with your cot. These vehicle safety hook types meet the needs of various emergency vehicle configurations, specifically the length and location of the floor structure support that is located in the rear of the vehicle.

To select which vehicle safety hook is appropriate for your vehicle configuration:

- Consider the location of the floor structure support where there is adequate room to mount the vehicle safety hook.
- Mount the vehicle safety hook into the back of the vehicle. Provide bumper clearance to allow the operators to load and unload the cot from the vehicle.
- Note the differences in vehicle design. Each vehicle safety hook provides a different mounting location option to maintain the appropriate distance between the face of the vehicle safety hook and the edge of the door sill.

Due to the differences in vehicle dimensions and the floor structure support locations, each vehicle safety hook allows for a different mounting location. Select the correct position for your vehicle safety hook installation.

- *Positioning of the vehicle safety hook, front to back (page 22)*
- *Positioning of the vehicle safety hook, side to side (page 23)*

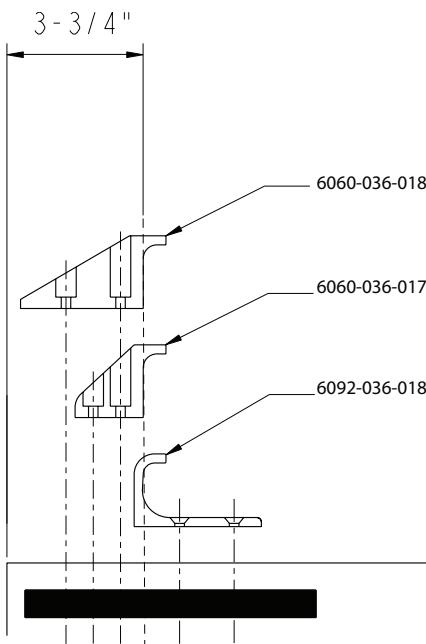


Figure 7 – Vehicle safety hook types

## Vehicle configuration

### **WARNING**

- Always have a certified mechanic, familiar with ambulance vehicle construction, install the vehicle safety hook to avoid injury to the patient or operator.
- Always consult the vehicle manufacturer before vehicle safety hook installation. Make sure that the installation of the vehicle safety hook does not damage or interfere with the brake lines, oxygen lines, fuel lines, fuel tank, or electrical wiring of the vehicle.

### **CAUTION** - Always set the cot load height before you place the cot into service.

The cot is compatible with all vehicle deck heights that meet the Federal Specification for the Star-of-Life Ambulance KKK-A-1822. See specifications for maximum load height.

According to Federal Specification for the Star-of-Life Ambulance KKK-A-1822:

- The rear of the ambulance shall be furnished with a sturdy, full-width, rear bumper, with step secured to the vehicle's chassis frame.
- The tread of the step shall have a minimum depth of 5 in. (13 cm) and a maximum depth of 10 in. (25 cm).
- If the step protrudes more than 7 in. (18 cm) from the rear of the vehicle, a fold-up step shall be furnished.

According to federal regulations (reference KKK-A-1822), the bumper height of the vehicle shall be installed equidistant  $\pm 2$  in. ( $\pm 5$  cm) from the vehicle floor to the ground level, which is defined as the vehicle deck height. Installation of the vehicle safety hook into any vehicle compliant with this federal specification provides adequate clearance for the cot base to lower to its fully extended position.

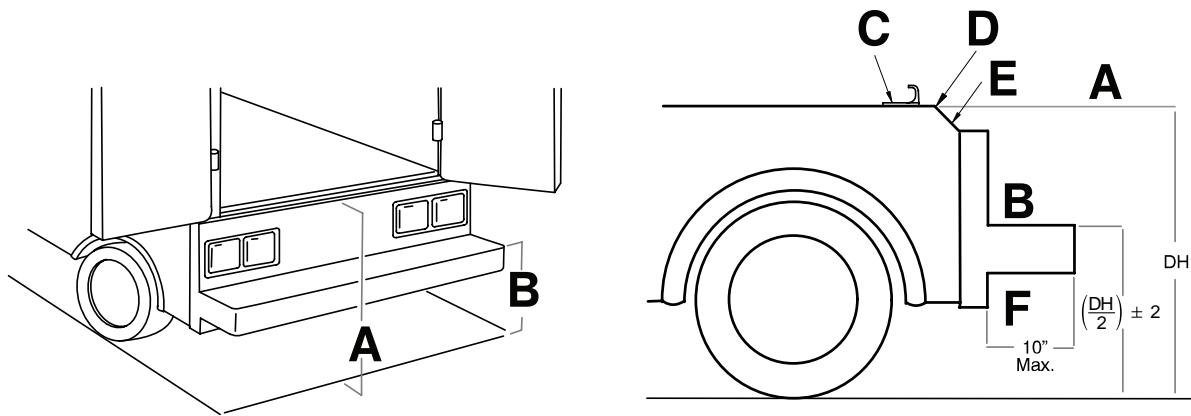


Figure 8 – Deck and bumper height

A	Deck height (DH)
B	Bumper height
C	Vehicle safety hook
D	Sill edge
E	Sill
F	Bumper depth

## Positioning of the vehicle safety hook, front to back

Before vehicle safety hook installation, check the front to back and side to side positioning when you unload and load the cot.

To check the front to back positioning:

1. Select the appropriate vehicle safety hook (*Selecting the vehicle safety hook* (page 20)).
2. Position the vehicle safety hook at least 3-3/4 in. from the leading edge of the door sill (A). The recommended distance from the face of the safety hook to be no less than 3-3/4 in.
3. Check that you can secure the vehicle safety hook to the mount in the back of the vehicle.
4. Check that you have adequate bumper clearance to allow the cot to be loaded and unloaded from the vehicle.
5. Confirm the side to side placement of the vehicle safety hook (*Positioning of the vehicle safety hook, side to side* (page 23)).

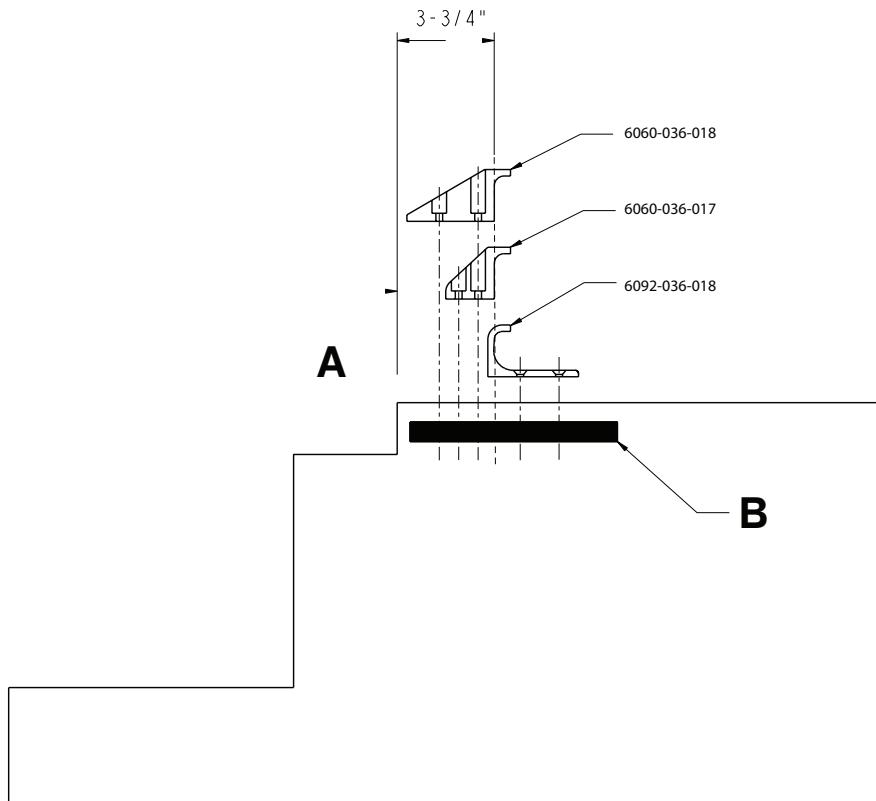


Figure 9 – Vehicle safety hook placement

A	Sill
B	Floor structure support

## Positioning of the vehicle safety hook, side to side

Before vehicle safety hook installation, check the front to back and side to side positioning when you unload and load the cot.

### **WARNING**

- Do not modify the cot or the vehicle safety hook. If the cot safety bar does not connect with the vehicle safety hook in any of these positions (left, center, or right), modify the vehicle.
- Always make sure that the cot safety bar connects with the vehicle safety hook every time before vehicle safety hook installation.

To check the side to side positioning:

1. Remove the cot from the cot fastener and unload it from the vehicle.

**Note** - Note the position of the cot load wheels and the cot safety bar when you remove the cot.

2. Mark the center of the cot safety bar on the vehicle floor.
3. Check that the position marked in step 3 is where the cot safety bar connects with the vehicle safety hook every time when you unload the cot in a variety of positions (such as all the way to the left and all the way to the right).

## Installing the vehicle safety hook

Before vehicle safety hook installation, the certified mechanic should plan for the placement of the vehicle safety hook in the rear of the vehicle patient compartment.

---

### WARNING

- Always have a certified mechanic, familiar with ambulance vehicle construction, install the vehicle safety hook to avoid injury to the patient or operator.
- Always consult the vehicle manufacturer before vehicle safety hook installation. Make sure that the installation of the vehicle safety hook does not damage or interfere with the brake lines, oxygen lines, fuel lines, fuel tank, or electrical wiring of the vehicle.
- Always make sure that the cot safety bar connects with the vehicle safety hook before you remove the cot from the vehicle patient compartment to avoid the risk of injury.
- Always use screws that are long enough to go through the vehicle patient compartment floor, washer, and nut, with at least two full threads in the nut. The socket head cap screw length depends on the thickness of the vehicle floor.

---

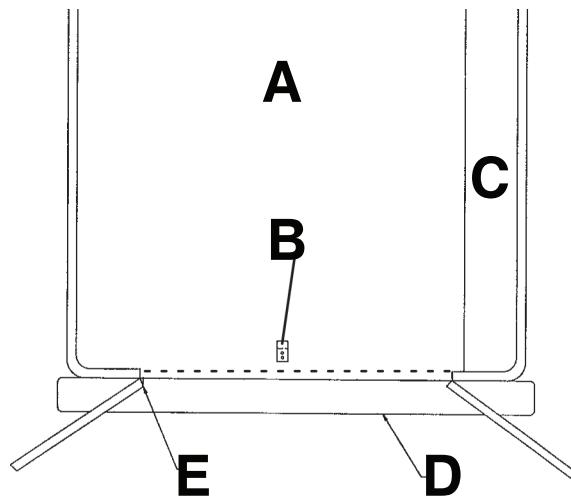
### Hardware required (not supplied):

- (2) Grade 5, minimum 1/4"-20 socket head cap screws \* for the short vehicle safety hook or long vehicle safety hook
- (2) Grade 5, minimum 1/4"-20 flat socket head cap screws \* for the J vehicle safety hook
- (2) Flat washers
- (2) Lock washers
- (2) 1/4"-20 nuts

1. Determine the correct vehicle safety hook front to back and side to side positioning, so the cot safety bar connects to the vehicle safety hook every time.
  - *Positioning of the vehicle safety hook, front to back* (page 22)
  - *Positioning of the vehicle safety hook, side to side* (page 23)
2. Drill the holes for the screws.
3. Fasten the vehicle safety hook to the vehicle patient compartment floor.
4. Check that the cot safety bar connects with the vehicle safety hook before you remove the cot from the vehicle patient compartment.



**Figure 10 – Safety bar secured in the vehicle safety hook**



**Figure 11 – Vehicle safety hook placement**

A	Top view of vehicle
B	Vehicle safety hook
C	Squad bench
D	Bumper
E	Door frame

After installation, check that the cot legs lock into the load position without contacting the vehicle bumper.

# Operation

## Setting cot load height with jog function

The adjustable cot load height with jog function allows you to preset the height of the load wheels to meet the ambulance deck height up to 36 in. The jog function assists operators when loading on an incline by jogging past the preset load height. You can set the cot load height from 26 in. to 36 in. (66 cm to 91 cm) as measured from the ground to the bottom of the load wheel.

To set the cot load height:

1. Locate the sensor housing on the patient right side of the cot.
2. Using a T27 Torx driver, remove the sensor housing cover by loosening the two screws (one on each end).
3. Adjust the left height sensor only inside the sensor housing: (Figure 12):
  - a. Move the sensor toward the head end to increase the set load height or move the sensor toward the foot end to decrease the set load height.
  - b. Press the retract (-) button to lower the cot to its lowest position, then press the extend (+) button to raise the cot to its set load height position.
  - c. Measure the cot height from the bottom of the load wheels to the floor.
- Note** - Add an additional 1/2 in. (1,3 cm) to your deck height measurement to allow for variations in patient weight or with other equipment that may be added to the cot.
- d. Repeat steps 3a and 3b until you reach the desired cot load height.
4. Secure the height sensor cables. All cables should lie flat inside the housing between the sensors.
5. Using a T27 Torx driver, reinstall the two screws (removed in step 2) to replace the sensor housing cover.



Figure 12 – Adjust left sensor height

## Checking the battery power level

Use the cot battery LED indicator to check the **SMRT** Pak power level. A charged **SMRT** Pak, in working condition, provides up to 25 calls with a 250 pound patient (actual results may vary). The 24 VDC **Power-PRO** system and the **SMRT** Pak is rated for 2.4 amp-hours of electric energy.

---

**WARNING** - Do not remove the battery when the cot is active.

---

**CAUTION** - Always charge the battery before you place the product into service. An uncharged or depleted battery may cause poor product performance.

---

To check the battery power level, press the retract (-) button on the cot control switch to activate the cot battery LED indicator. The cot battery LED indicator is located at the foot end control enclosure (shown as a battery symbol).

- The LED is solid green when the battery has a full charge or has an adequate battery power charge.

**Note** - For best results, use the **SMRT** Pak until the cot battery LED indicator changes from solid green to flashing amber.

- The LED flashes amber when you need to charge or replace the battery

**Note** - The cot battery LED indicator does not have to flash amber before you remove and replace the **SMRT** Pak, however, this is considered to be a best practice. You can remove and recharge the **SMRT** Pak at any time.

- The LED is a solid amber to indicate a battery error.

**Note**

- Only use Stryker approved batteries.
- If equipped, the powered cot fastener automatically charges the **SMRT** Pak battery. Automatic charging occurs when you lock the cot into the powered cot fastener (no cable or connectors required). The cot battery LED indicator flashes green for a moment to signify that it is charging.
- Automatic charging will only occur with **SMRT** Pak batteries.

## Checking the hour meter and error display

The hour meter indicates the amount of time (HHH.H hours) that the hydraulics were in use. The error display provides error code information for troubleshooting.

Use the hour meter (A) (Figure 13) to determine the frequency of preventive maintenance. Use the error display (A) for troubleshooting. The error display overrides the hour meter display when an error occurs.

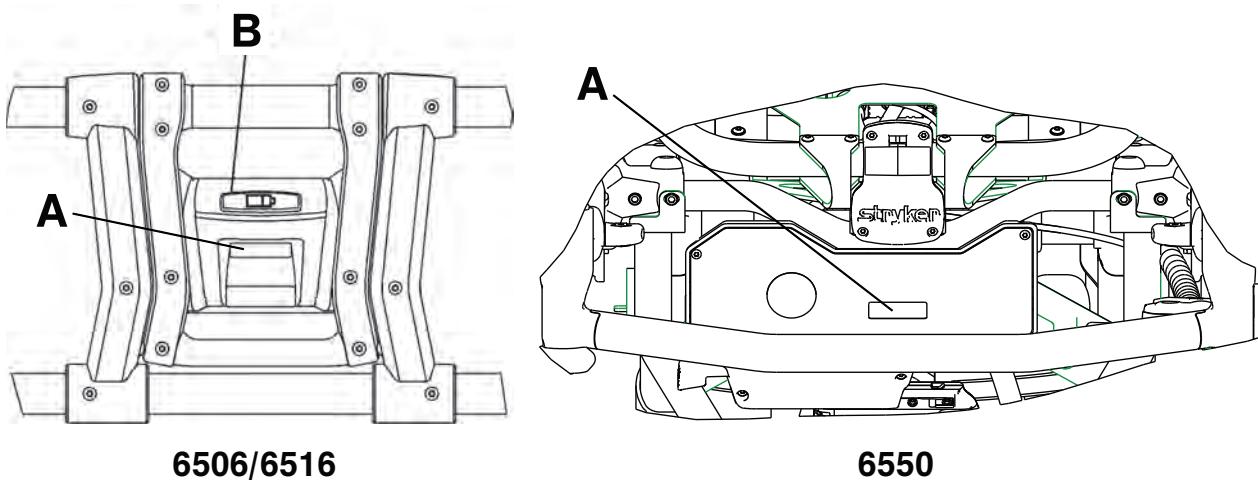


Figure 13 – Checking the hour meter (A), error display (A), and battery status (B)

## Operating guidelines

**WARNING**

- Always operate the product only when all persons are clear of the mechanisms. Entanglement in powered product mechanisms can cause serious injury.
- Always inspect **SMRT** Paks for damage before every use.
- Do not allow untrained assistants to assist in the operation of the product.
- Always follow proper hand placement on hand grips. Keep all hands clear of the red safety bar pivots when you load or unload the cot or change cot height position.
- Do not ride on the base of the cot.
- Do not transport the cot sideways to avoid the risk of tipping. Always transport the cot in a lowered position, head end or foot end first to minimize the risk of tipping.

- Always keep hands, fingers, and feet away from moving parts. Use caution when placing your hands and feet near the base tubes while you raise or lower the cot.
- Always install the in-fastener shut-off system in any emergency vehicle that will be used with this cot and an antler style cot fastener.
- Always conduct patient monitoring when the cot is idle. If you hydraulically raise or lower the product you may temporarily affect electronic patient monitoring equipment.

---

**CAUTION** - Always clear any obstacles that may interfere and cause injury to the operator or patient before operating the product.

---

- Operate the product only as described in this manual.
- Read all labels and instructions on the product before use.
- Practice changing height positions and loading the cot until you fully understand the operation of the product.
- Inspect the **SMRT** Pak housing and terminal area for any cracks or damage before first and every use.
- Always load or unload an occupied cot with a minimum of two trained operators. Two operators must be present when a cot is occupied. Stryker recommends that both operators are at the foot end to reduce the load on each operator. One or two operators can lift from the foot end of the cot.
- Do not adjust, roll, or load the cot into a vehicle without advising the patient. Stay with the patient and control the product at all times.
- You can transport the cot in any position. Stryker recommends that the operators transport the patient in the lowest comfortable position to maneuver the cot.
- Only use the wheel locks during patient transfer or without a patient on the product.
- Do not apply a wheel lock when an occupant is on the product or when moving the product to avoid the risk of tipping.
- Use properly trained helpers to control the cot, when necessary.

## Proper lifting techniques

When you lift the product and occupant, follow these proper lifting techniques to avoid the risk of injury:

- Keep your hands close to your body
- Keep your back straight
- Coordinate all movement with your partner
- Lift with your legs
- Avoid twisting

## Transferring the patient to the cot

---

### WARNING

- Always use all restraint straps to secure the patient on the product. An unrestrained patient may fall from the product and be injured.
- Do not leave a patient unattended. Hold the product while a patient is on the product.
- Do not apply a wheel lock when a patient is on the product or when you move the product to avoid the risk of tipping.
- Do not use siderails as a patient restraint device.

---

To transfer the patient to the product:

1. Roll the product to the patient (*Rolling the cot with a patient* (page 29)).
2. Place the product beside the patient and raise or lower the product to the level of the patient.
3. Lower the siderails and open the restraint straps.

4. Transfer the patient to the product. Follow accepted EMS procedures.
5. Secure the patient to the product with all of the restraint straps.
6. Raise the siderails and adjust the backrest and footrest as necessary.

## Rolling the cot with a patient

---

### **WARNING**

- Always transport the cot at a lower height to reduce the risk of a cot tip. If possible, obtain additional assistance or take an alternate route.
- Always avoid high obstacles, such as curbing, steps, or rough terrain to avoid the risk of the product tipping over.

To roll the cot with a patient:

1. Position one operator at the foot end and one operator at the head end of the cot.
2. Make sure that the litter is perpendicular when you approach door sills or other low obstacles.
3. Lift each set of wheels over the door sill or obstacle separately.

## Raising or lowering the cot

You can raise or lower an unoccupied cot with one operator. If a patient is on the cot, a minimum of two trained operators (one located at each end of the cot) are required to raise or lower the cot.

### **WARNING**

- Always keep hands, fingers, and feet away from moving parts. Use caution when placing your hands and feet near the base tubes while you raise or lower the cot.
- Always follow proper hand placement on hand grips. Keep all hands clear of the red safety bar pivots when you load or unload the cot or change cot height position.
- Do not use the jog function to jog past the set cot load height after the cot safety bar connects with the vehicle safety hook.
- Always use two operators to raise or lower the cot with a patient.

To raise or lower the cot:

1. Operator 1 (foot end): Grasp the cot frame and press the:
  - Extend (+) button to raise the cot to the desired height
  - Retract (-) button to lower the cot to the desired height
2. Operator 2 (head end): Maintain a firm grip on the outer rail until the cot is at the desired height.

**Note** - If you press the extend (+) button on the cot control switch after the cot reaches the set cot load height, the motor will remain halted until you release the button. After you release the button, press the extend (+) button again to jog the cot height up higher.

## Raising, lowering, or releasing the cot with power

There are two identical cot control switches located on the Power-PRO cots. Press the button on either of these switches to raise (extend) the cot, lower (retract) the cot, or release the cot from Power-LOAD, if applicable (Figure 14).

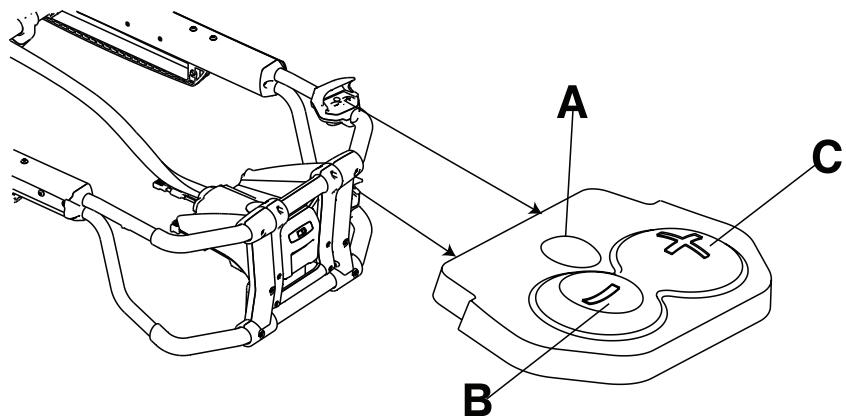


Figure 14 – Cot control switches

Reference	Name	Description
A	Release	Press to unlock the cot (for use with <b>Power-LOAD</b> only)
B	Retract (-)	Press and hold to lower the litter or retract the cot undercarriage
C	Extend (+)	Press and hold to raise the litter or extend the cot undercarriage

## Raising or lowering the cot manually with the manual override

In the event of loss of electrical function, you can use the cot manual override. This allows manual operation of the product until the restoration of the electrical, powered functions. Use the red manual back-up release handle to raise or lower the cot.

The manual back-up release handle is located is along the patient left side of the lower lift bar at the foot end of the cot.

To raise or lower the cot with the manual back-up release handle:

1. Both operators: Lift the cot during the raise or lower operation to support the weight of the cot at each end.
2. Operator 1 (foot end):
  - a. Pull the manual back-up release handle toward the lift bar.
  - b. While pulling the manual back-up release handle, raise or lower the cot to the desired position.
  - c. Release the handle to lock the cot into position

### Note

- Both operators must lift the cot weight off of the wheels to use the manual extend or retract while a patient is on the cot.
- Activation of the manual back-up release handle may cause the cot to lower at a slow rate if less than 50 lb (23 kg) are on the cot.
- Hydraulic fluid will become more viscous when the cot is used for extended periods in cold temperatures. When using the manual back-up release function to extend the base, while unloading in cold weather conditions, hold the manual back-up release handle for approximately one second after the cot wheels touch the ground to minimize sagging of the litter as you remove the cot from the vehicle patient compartment.

## Expediting load with the high speed retract mode

When you press the retract (-) button, the cot will enter the high speed retract mode when the cot wheels are not supporting the weight of the cot and patient.

The high-speed retract mode expedites loading of the cot into a vehicle. The undercarriage retracts toward the highest position once the weight of the cot and patient is no longer supported by the wheels. Press the retract (-) button to actuate the control switch.

## Loading or unloading a cot with the Power-LOAD option

The cot is fully compatible with the Model 6390 **Power-LOAD** system if you ordered the cot with the **Power-LOAD** option or upgraded your cot with the compatibility kit.

---

### WARNING

- Always use **Power-LOAD** with the 6085/6086 **Performance-PRO XT**, 6500/6506 **Power-PRO XT**, and 6510/6516 **Power-PRO IT** cots with the **Power-LOAD** option only. In certain situations, you can use **Power-LOAD** as a standard antler for most X-frame cots, but a rail clamp assembly is required for all cots without the **Power-LOAD** option.
- Always make sure that you use a **Power-PRO** date of manufacture cot with the Stryker Model 6390 **Power-LOAD** system to avoid the risk of injury.

Cot	Compatibility kit
Model 6506 <b>Power-PRO XT</b>	6506-700-001
Model 6516 <b>Power-PRO IT</b>	6516-700-001
Model 6086 <b>Performance-PRO XT</b>	6086-700-001

For more information about using your **Power-LOAD** compatible cot, see the **Power-LOAD** Operations Manual.

## Loading a cot into a vehicle with an antler style cot fastener

Always load an occupied cot with a minimum of two trained operators. Two operators must be present when a cot is occupied. Operators must be able to lift the total weight of the patient, cot, and any items on the cot.

---

### WARNING

- Always support the load of the patient, cot, and accessories after the weight is off of the ground.
- Always use two operators when a cot is occupied.
- Always follow proper hand placement on hand grips. Keep all hands clear of the red safety bar pivots when you load or unload the cot or change cot height position.
- Do not load the cot into a vehicle with the head section retracted when using a cot fastener. The cot may tip or not connect with the cot fastener.

Stryker recommends that both operators are at the foot end to reduce the load on each operator. One or two operators can lift from the foot end of the cot. The higher an operator must lift the cot, the more difficult it may be to hold the weight. The operator must be able to lift the cot high enough for the cot legs to extend when the cot is unloaded. An operator may need help if they are too short or if the patient is too heavy to lift when unloading the cot. If you are a shorter operator, you may need to raise your arms higher to allow the cot legs to extend.

**Note** - You can load an unoccupied cot into a vehicle with one operator.

To load the cot into a vehicle:

- Extend and lock the retractable head section.
- Place the cot in a loading position. A loading position is any position where the load wheels meet the vehicle floor height.
- Lift the vehicle bumper, if equipped, to the raised position.

4. Roll the cot to the open door of the vehicle patient compartment.
5. Push the cot forward until the load wheels are on the vehicle patient compartment floor and the cot safety bar passes the vehicle safety hook.
6. Pull the cot back until the cot safety bar connects to the vehicle safety hook for maximum clearance to lift the base.
7. Make sure that the cot safety bar connects with the vehicle safety hook.
8. Load the cot.

---

**WARNING** - Always use the powered method to load an unoccupied cot with one operator. Do not use the manual method to load an unoccupied cot with one operator.

---

- Powered method - using the cot control switches (*Raising, lowering, or releasing the cot with power* (page 29)):

With both operators at the foot end (recommended method)	With one operator at the foot end and one operator on the side	With one operator (when loading an unoccupied cot)
<ul style="list-style-type: none"> <li>a. Both operators: Grasp the cot frame at the foot end.</li> <li>b. Operator 1: Press and hold the retract (-) button to retract the cot undercarriage.</li> </ul>	<ul style="list-style-type: none"> <li>a. Operator 1: Grasp the cot frame at the foot end and press and hold the retract (-) button to retract the cot undercarriage.</li> <li>b. Operator 2: Grasp the cot outer rail to stabilize the cot as the cot undercarriage retracts.</li> </ul>	Grasp the cot frame at the foot end and press and hold the retract (-) button to retract the cot undercarriage.

- Manual method - using the manual back-up release handle:

- a. Operator 1 (at the foot end):
  - i. Grasp the cot frame at the foot end.
  - ii. Lift the foot end of the cot until you lift the weight off of the cot base.
  - iii. Squeeze and hold the manual back-up release handle.
- b. Operator 2 (on the side):
  - i. Grasp the cot outer rail to stabilize the cot as you retract the cot undercarriage.
  - ii. Raise the cot undercarriage until it stops in the highest position.

9. Push the cot into the vehicle patient compartment.

10. Make sure that the cot is secured in the cot fastener (not included).

**Note** - When you use the manual back-up release handle, do not lift the base rapidly or the movement may appear sluggish. Lift with a slow, constant motion.

## Unloading a cot from a vehicle with an antler style cot fastener

Always unload an occupied cot with a minimum of two trained operators. Two operators must be present when a cot is occupied. Operators must be able to lift the total weight of the patient, cot, and any items on the cot.

---

**WARNING**

- Always support the load of the patient, cot, and accessories after the weight is off of the ground.
- Always make sure that two operators are present when a cot is occupied.
- Always follow proper hand placement on hand grips. Keep all hands clear of the red safety bar pivots when you load or unload the cot or change cot height position.
- Always make sure that the cot safety bar connects with the vehicle safety hook before you remove the cot from the vehicle patient compartment to avoid the risk of injury.
- Do not pull or lift on the cot safety bar when you unload the cot.

- Always set the cot transfer wheels safely on the ground when you unload the cot from the vehicle patient compartment to avoid the risk of product damage.
- Do not use the jog function to jog past the set cot load height after the cot safety bar connects with the vehicle safety hook.

Stryker recommends that both operators are at the foot end to reduce the load on each operator. One or two operators can lift from the foot end of the cot. The higher an operator must lift the cot, the more difficult it may be to hold the weight. The operator must be able to lift the cot high enough for the cot legs to extend when the cot is unloaded. An operator may need help if they are too short or if the patient is too heavy to lift when unloading the cot. If you are a shorter operator, you may need to raise your arms higher to allow the cot legs to extend.

**Note** - You can unload an unoccupied cot from a vehicle with one operator.

To unload the cot from a vehicle:

1. Lift the vehicle bumper, if equipped, to the raised position.
2. Remove the cot from the cot fastener.
3. Unload the cot.
  - Manual method - using the manual back-up release handle:

With both operators at the foot end (recommended method)	With one operator at the foot end and one operator on the side	With one operator (when unloading an unoccupied cot)
<p>a. Both operators: Grasp the cot frame at the foot end.</p> <p>b. Operator 1: Pull the manual back-up release handle to extend the cot undercarriage. Pull the cot out of the vehicle patient compartment until the safety bar connects with the vehicle safety hook. Release the manual back-up release handle when the base is fully extended.</p> <p>c. Operator 2: Make sure that the safety bar connects with the vehicle safety hook. Pull the safety bar release lever forward to remove the safety bar from the vehicle safety hook.</p>	<p>a. Operator 1: Grasp the cot frame at the foot end. Pull the manual back-up release handle to extend the cot undercarriage. Pull the cot out of the vehicle patient compartment until the safety bar connects with the vehicle safety hook. Release the manual back-up release handle when the base is fully extended.</p> <p>b. Operator 2: Make sure that the safety bar connects with the vehicle safety hook. Grasp the cot outer rail to stabilize the cot. Pull the safety bar release lever forward to remove the safety bar from the vehicle safety hook.</p>	<p>a. Grasp the cot frame at the foot end.</p> <p>b. Pull the manual back-up release handle to extend the cot undercarriage.</p> <p>c. Pull the cot out of the vehicle patient compartment until the safety bar connects with the vehicle safety hook.</p> <p>d. Release the manual back-up release handle when the base is fully extended.</p> <p>e. Pull the safety bar release lever forward to remove the safety bar from the vehicle safety hook.</p>

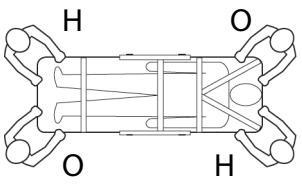
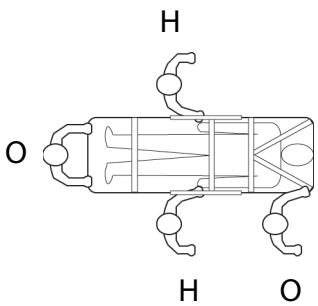
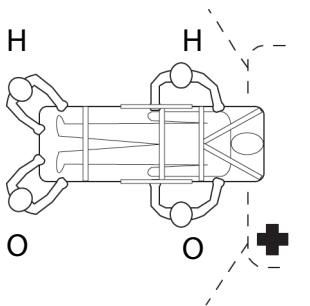
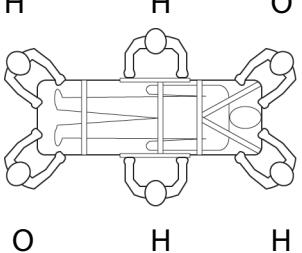
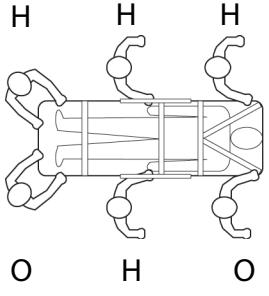
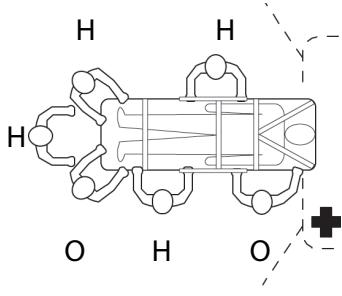
- Powered method - using the cot control switches:

With both operators at the foot end	With one operator at the foot end and one operator on the side	With one operator (when unloading an unoccupied cot)
<p>a. Both operators: Grasp the cot frame at the foot end.</p> <p>b. Both operators: Pull the cot out of the vehicle patient compartment until the safety bar connects with the vehicle safety hook.</p> <p><b>WARNING - Do not press the extend (+) button until the safety bar connects with the vehicle safety hook.</b></p> <p>c. Operator 2: Make sure that the safety bar connects with the vehicle safety hook.</p> <p>d. Operator 1: Depress the extend (+) button to extend the cot undercarriage.</p> <p>e. Operator 2: Pull the safety bar release lever forward to remove the safety bar from the vehicle safety hook.</p> <p><b>Note</b> - You can use the manual back-up release handle or a combination of the manual back-up release handle, followed by the extend (+) button. If you use the extend (+) button, squeeze and hold the manual back-up release handle before you press and hold the extend (+) button.</p>	<p>a. Operator 1: Grasp the cot frame at the foot end and pull the cot out of the vehicle patient compartment until the safety bar connects with the vehicle safety hook.</p> <p><b>WARNING - Do not press the extend (+) button until the safety bar connects with the vehicle safety hook.</b></p> <p>b. Operator 2: Grasp the cot outer rail to stabilize the cot.</p> <p>c. Operator 1: Depress the extend (+) button to extend the cot undercarriage.</p> <p>d. Operator 2: Pull the safety bar release lever forward to remove the safety bar from the vehicle safety hook.</p> <p><b>Note</b> - You can use the manual back-up release handle or a combination of the manual back-up release handle, followed by the extend (+) button. If you use the extend (+) button, squeeze and hold the manual back-up release handle before you press and hold the extend (+) button.</p>	<p>a. Grasp the cot frame at the foot end.</p> <p>b. Pull the cot out of the vehicle patient compartment until the safety bar connects with the vehicle safety hook.</p> <p><b>WARNING - Do not press the extend (+) button until the safety bar connects with the vehicle safety hook.</b></p> <p>c. Depress the extend (+) button to extend the cot undercarriage.</p> <p>d. Pull the safety bar release lever forward to remove the safety bar from the vehicle safety hook.</p>

4. Remove the load wheels from the vehicle patient compartment floor.

## Positioning operators and helpers

**WARNING** - Always follow proper hand placement on hand grips. Keep all hands clear of the red safety bar pivots when you load, unload, or change the cot height position.

	Changing levels	Rolling	Loading and unloading
Two operators (O) Two helpers (H)			
Two operators (O) Four helpers (H)			

## Raising or lowering the backrest

To raise the backrest, squeeze the backrest adjustment handle to move the backrest to the desired height.

To lower the backrest, squeeze the backrest adjustment handle while you push down on the backrest to the desired height.

## Raising or lowering the siderails

Always lower the siderails when you transfer a patient to the cot or from the cot.

**WARNING** - Do not use siderails as a patient restraint device.

To raise the siderails, lift up on the siderail until the latch clicks and the siderail locks into place. Always keep the siderails in the raised position unless you are transferring the patient.

To lower the siderails, squeeze the siderail release handle to release the siderail latch. Guide the siderail down toward the foot end of the cot until the siderail lays flat. Always lower the siderails when you transfer a patient to or from the cot.

## Raising or lowering the siderails (XPS option)

You can order your cot with the expandable patient surface (XPS) option or upgrade your cot to add the XPS option.

---

### **WARNING** - Do not use siderails as a patient restraint device.

---

#### **CAUTION**

- Do not sit or stand on the siderails (XPS option).
- Do not use the siderails (XPS option) as a patient transfer device or surface (for example, to slide a patient from the cot to another surface).
- Do not position patients with full weight on the siderails (XPS option).
- Do not use the siderails (XPS option) as a push/pull device or to steer the product.

---

Siderails (XPS option) attach to the cot and are always available for your use. The siderails (XPS option) adjust according to patient size and lock into seven positions. The siderails also adjust to fit through standard doorways or elevators.

To raise the siderails, lift up on the siderail until it locks into the desired position.

To lower the siderails, lift up to relieve the weight, then pull the red lever. Always lower the siderails when you transfer a patient to or from the cot.

The XPS option is not a primary patient support surface. It includes a wider mattress and is intended to enhance patient comfort.

## Extending the retractable head section

Extend the retractable head section before you load the cot into the vehicle patient compartment.

---

### **WARNING**

- Always lock the head section into place before you operate the cot.
- Do not load the cot into a vehicle with the head section retracted when using a cot fastener. The cot may tip or not connect with the cot fastener.

---

To extend the retractable head section:

1. Grasp the outer rail with one hand for support and pull the head section release handle. Rotate the head section release handle toward the head end of the cot to release the head section from the locked position.
2. Release the head section release handle, then pull the head section away from the litter frame. Lengthen the head section to the extended position.
3. Release the head section release handle to lock the head section in the extended position.

## Retracting the retractable head section

Retract the retractable head section to roll the cot in any direction on the load wheels for improved mobility and maneuverability, even in the lowest position.

---

### **WARNING**

- Always lock the head section into place before you operate the cot.
- Do not load the cot into a vehicle with the head section retracted when using a cot fastener. The cot may tip or not connect with the cot fastener.

---

To retract the retractable head section:

1. Grasp the outer rail with one hand for support and release the head section release handle. Rotate the head section release handle toward the head end of the cot to release the head section from the locked position.

2. Release the head section release handle, then push the head section toward the litter frame. Retract the head section to the retracted position.
3. Release the head section release handle to lock the head section in the retracted position.

## Raising or lowering the footrest

You can adjust the footrest to elevate the patient's legs.

To raise the footrest, lift the frame as high as possible. The support bracket automatically secures the frame when you release the footrest.

To lower the footrest, lift the frame and lift up on the footrest release handle until the frame releases the support bracket. Lower the footrest until it lays flat.

## Raising or lowering the knee Gatch option

To raise the knee Gatch:

1. Lift either of the red lifting loops (A) until the knee Gatch is in the highest position (Figure 15).
2. Lower the knee Gatch to secure the support bracket to the locking mechanism.
3. Make sure that the locking mechanism is secure before you release the lifting loop.

To lower the knee Gatch, lift either of the red lifting loops (A) to relieve pressure on the locking mechanism, and while holding the loop, push on the red footrest release handle (B) until the support bracket is released. Lower the knee Gatch until it lays flat.

To raise the knee Gatch in trend, lift the footrest frame (C) as high as possible until the frame locks into place. The support bracket automatically connects when you release the frame.

To lower the knee Gatch in trend, lift the footrest frame (C), and while holding the frame, lift up on the red footrest release handle (B) until the frame releases the support bracket. Lower the footrest until it lays flat.

**Note** - The foot end oxygen bottle holder option (6500-240-000) is not compatible with the knee Gatch option (6500-082-000).

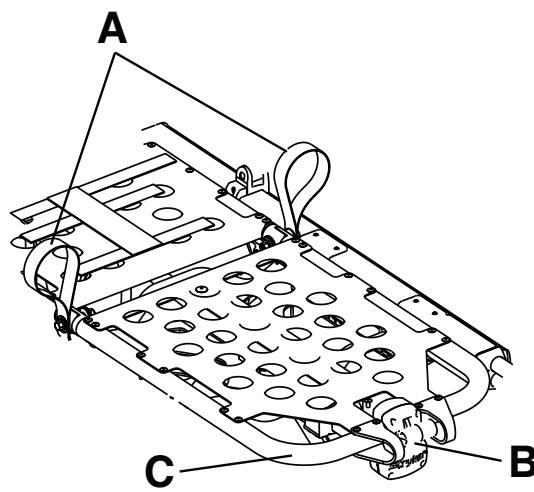


Figure 15 – Gatch

## Applying or releasing a wheel lock

### WARNING

- Do not apply a wheel lock when a patient is on the product or when you move the product to avoid the risk of tipping.

- Do not install or apply a wheel lock on a product with worn wheels that are less than 6 in. diameter.
- Do not leave a patient or occupant unattended. Hold the product while a patient or occupant is on the product.

---

To apply a wheel lock, press down on the pedal until it stops and is resting against the surface of the wheel.

To release a wheel lock, press down on the top of the pedal with your foot or lift up on the pedal with your toe. The top of the pedal will rest against the caster frame when you release the wheel lock.

**Note** - Wheel locks help prevent the product from rolling while unattended. Wheel locks may not provide sufficient resistance on all surfaces or under loads.

## Applying or releasing the Steer-Lock option

To apply the Steer-Lock:

1. From the cot foot end, press the red (lock) side of the foot pedal or from the cot head end, press down on either red pedal.
2. Rotate the cot until at least one head end caster locks.

To release the Steer-Lock:

- From the cot foot end, press the green (unlock) side of the foot pedal or from the cot head end, lift up on either red pedal at the head end.

## Applying or releasing the kickstand option for dialysis scale

Use the kickstand to weigh patients on a scale.

---

### WARNING

- Always use two operators when using the kickstand.
- Always center the patient weight on the cot before you use the kickstand.
- Always apply the kickstand with your foot only.
- Always lower the cot height before you apply the kickstand for increased stability.
- Do not apply the kickstand during transport. Keep the kickstand in the retracted position.
- Do not use the kickstand as a brake.
- Do not apply the kickstand on a sloped surface.

---

**Note** - The kickstand option (6085-102-000) is not compatible with the base storage net option (6500-160-000).

To apply the kickstand:

1. Operator 1: Apply the kickstand with your foot.
2. Operator 2: Lift the foot end of the cot to actuate the kickstand.
3. Both operators: Make sure that the kickstand is in the forward locked position.

To release the kickstand, Operator 1 lifts the foot end of the cot until both wheels are off the floor. Operator 2 rolls the cot forward to make sure that the kickstand retracts.

## Securing the patient with the G-rated restraint straps

---

### WARNING

- Always use all restraint straps to secure the patient on the product. An unrestrained patient may fall from the product and be injured.
- Do not attach restraint straps to the base tubes or cross tubes.

---

---

**CAUTION** - Do not entangle the restraint straps in the base frame when you raise or lower the cot.

---

**Note** - Restraint straps are a Type BF applied part.

Secure restraint straps to the cot in the required attachment locations (Figure 16). Restraint strap attachment locations should provide strong anchorage and proper restraint position. Do not allow restraint straps to interfere with equipment or accessories. Buckle the restraint straps across the patient's shoulders, waist, and legs. Buckle restraint straps when the cot is not in use.

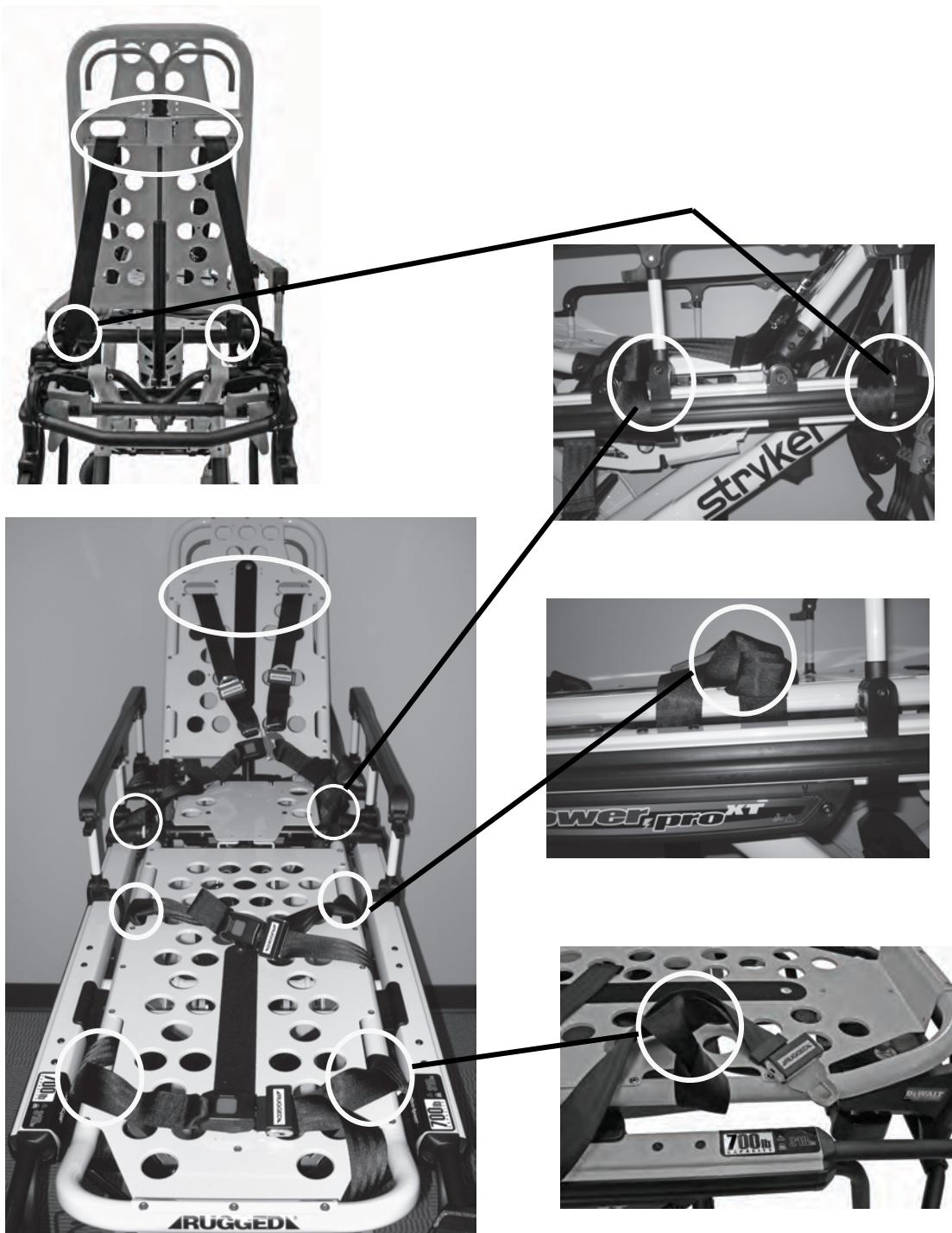


Figure 16 – Restraint strap attachment points

### Attaching the shoulder, thigh, or ankle restraints

To attach the shoulder, thigh, or ankle restraints:

1. Wrap the restraint strap around the cot frame.
2. Push the restraint strap buckle through the loop.
3. Pull the buckle around the loop to secure the restraint strap to the cot.



**Figure 17 – Wrap the restraint strap around the cot frame**



**Figure 18 – Push the restraint strap buckle through the loop**



**Figure 19 – Secure the restraint strap to the cot**

## Attaching the waist restraints

**WARNING** - Always form an X with the waist restraint strap and the shoulder restraint strap.

To attach the waist restraints:

1. Wrap the restraint strap around the cot frame.
2. Push both buckles through the loop for the double buckle strap.
3. Push the buckle and the tongue through the loop for the tongue and buckle strap.
4. Pull the buckle through the loop to secure the restraint strap to the cot.

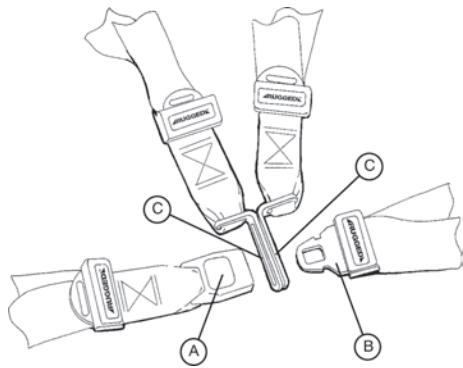
## Adjusting restraint straps

Open the restraint straps and place them at either side of the cot while you position the patient on the cot mattress. Lengthen the restraint straps, buckle them around the patient, and shorten them to tighten.

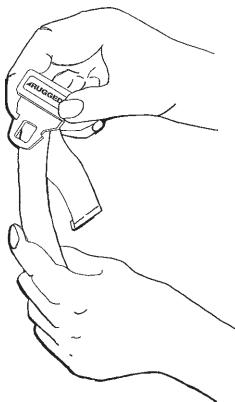
- To open the restraint strap, press the red button on the front of the buckle receiver. This allows you to release the buckle latch plate and pull it out of the receiver.
- To close the restraint strap, push the latch plate into the receiver until you hear a click.
- To lengthen the restraint strap, grasp the buckle latch plate, turn it at an angle to the webbing, then pull it out. A hemmed tab at the end of the webbing prevents the latch plate from coming off of the strap.
- To shorten the restraint strap, grasp the hemmed tab and pull the webbing back through the latch plate to tighten.

When you buckle a restraint strap around a patient, secure the latch plate and remove any loose webbing from the cot.

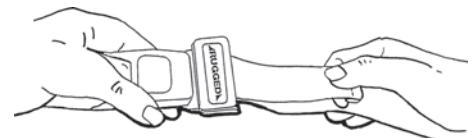
Inspect the restraint straps at least once a month (more if used often). Check for a bent or broken receiver or latch plate, or torn or frayed webbing. Replace any worn or inoperable restraint strap.



**Figure 20 – Buckle the straps around the patient**



**Figure 21 – Lengthen the restraint strap**



**Figure 22 – Shorten the restraint strap**

## Securing a patient with the X-restraint/XPR restraint straps

Secure restraint straps to the cot in the required attachment locations: shoulders, waist, thighs, and ankles.

---

### **WARNING**

- Always use all restraint straps to secure the patient on the product. An unrestrained patient may fall from the product and be injured.
- Do not attach restraint straps to the base tubes or cross tubes.

---

**CAUTION -** Do not entangle the restraint straps in the base frame when you raise or lower the cot.

---

### **Note**

- The X-restraint/XPR (6500-001-430/650600030010) restraint straps are only compatible with the wider Gatch bolster mattress (6500-003-130/6506-003-130).
- Restraint straps are a Type BF applied part.

Restraint strap attachment locations should provide strong anchorage and proper restraint position (Figure 23). Do not allow restraint straps to interfere with equipment or accessories. Buckle the restraints across the shoulders, waist, thighs, and ankles. Buckle all restraint straps when the cot is not in use.

1. *Attaching the X-restraint/XPR shoulder restraints* (page 43)
2. *Attaching the X-restraint/XPR waist restraints* (page 44)
3. *Attaching the X-restraint/XPR thigh restraints* (page 44)
4. *Attaching the X-restraint/XPR ankle restraints* (page 44)
5. *Attaching the X-restraint/XPR ankle restraints* (page 45)



**Figure 23 – Restraint strap attachment locations**

### **Attaching the X-restraint/XPR shoulder restraints**

To attach the X-restraint/XPR shoulder restraints:

1. Wrap the restraint around the cot frame.
2. Pull the restraint buckle through the loop, toward the head end of the cot.
3. Feed the buckle under the XPS System.
4. For the Model 6506 Power-PRO XT cot and Model 6086 Performance-PRO XT cot, pull the restraint tight and toward the back of the backrest.
5. For the Model 6550 Power-PRO TL cot, pull the restraint under the cross tube and toward the back of the backrest.
6. Feed the buckle through the opening in the backrest.
7. Connect the patient right shoulder buckle to the patient left waist buckle.
8. Remove any slack from the restraint strap loop.



Figure 24 – Shoulder restraints

### Attaching the X-restraint/XPR waist restraints

To attach the X-restraint/XPR waist restraints:

1. Wrap the restraint around the cot frame.
2. Pull the restraint buckles through the loop, toward the head end of the cot.
3. Feed the buckle under the XPS System.
4. Pull the buckles tight. One restraint should angle toward the head end and one should lay straight across the cot.
5. Connect the patient right buckle to the patient left buckle.
6. Remove any slack from the restraint strap loop.



Figure 25 – Waist restraints

### Attaching the X-restraint/XPR thigh restraints

To attach the X-restraint/XPR thigh restraints:

1. Wrap the restraint around the cot litter.
2. Pull the restraint buckle through the loop, toward the head end of the cot.
3. Pull the restraint tight.
4. Connect the patient right buckle to the patient left buckle.
5. Remove any slack from the restraint strap loop.

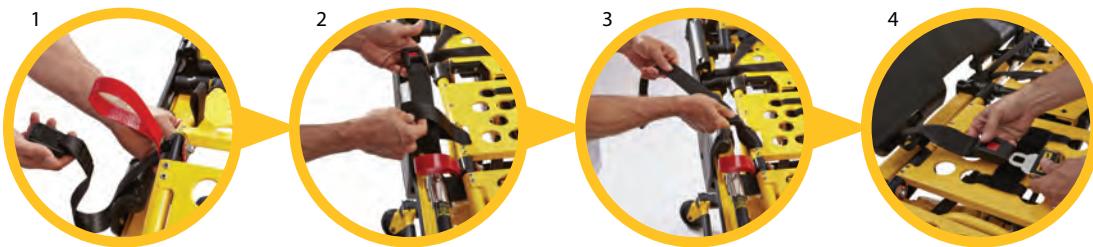


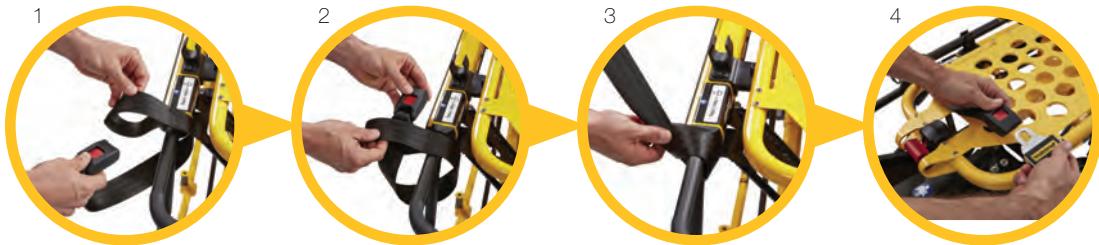
Figure 26 – Thigh restraints

### Attaching the X-restraint/XPR ankle restraints

For Model 6506 Power-PRO XT cots and Model 6086 Performance-PRO XT cots built before July 3, 2015 with the Gatch option only.

To attach the X-restraint/XPR ankle restraints:

1. Wrap the restraint around the cot frame. Wrap around both foot end lift bars.
2. Pull the restraint buckle through the loop, toward the head end of the cot.
3. Pull the buckle tight.
4. Connect the patient right buckle to the patient left buckle.
5. Remove any slack from the restraint strap loop.



**Figure 27 – Ankle restraints**

### **Attaching the X-restraint/XPR ankle restraints**

For Model 6506 Power-PRO XT cots, Model 6086 Performance-PRO XT cots, and Model 6550 Power-PRO TL cots built or upgraded after July 3, 2015 with the Gatch option or any trend only.

To attach the X-restraint/XPR ankle restraints:

1. Wrap the restraint around the cot litter.
2. Pull the restraint buckle through the loop, toward the head end of the cot.
3. Pull the buckle tight.
4. Connect the patient right buckle to the patient left buckle.
5. Remove any slack from the restraint strap loop.

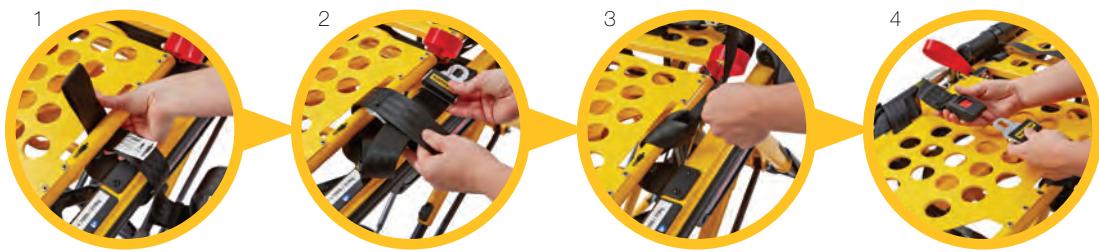


Figure 28 – Ankle restraints

## Adding a restraint strap extension

Add a restraint strap extension (6082-160-050) for extra length when you buckle the lap belt around larger patients.

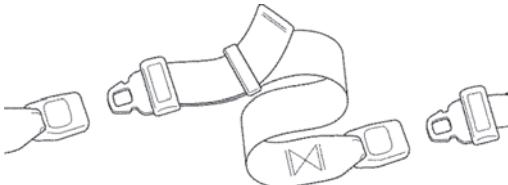


Figure 29 – Restraint strap extension

## Securing the patient with the Pedi-Mate® infant restraint system

**WARNING** - Always locate the buckle away from obstructions or accessories on the cot to avoid the risk of accidental release of Pedi-Mate® infant restraint system and injury to the infant.

To secure the patient with the Pedi-Mate® infant restraint system:

1. Remove any restraints from the cot.
2. Raise the cot backrest to the full upright position.
3. Position the Pedi-Mate® pad flat on the cot backrest with the black backrest straps facing out.
4. Wrap the straps around the cot backrest and insert the ends of the straps through the brackets.
5. Fasten the buckle.
6. Pull on the end of the adjustable backrest strap to tighten.
7. Insert the mainframe straps between the product frame and the mattress.
8. Insert the buckle behind the litter cross brace and bring it up in front of the litter cross brace.
9. Fasten the buckle around the litter cross brace. Leave slack in the strap for final adjustment.
10. Tighten all straps.

**Note** - For more information about the Pedi-Mate® infant restraint system, see the manufacturer's instructions for use, operation, and care. Safe and proper use of the Pedi-Mate® infant restraint system is at the discretion of the user. Set methods and procedures to educate and train your staff on the safe operation or maintenance of this product. These are general instructions only. Keep these instructions for future reference. These instructions are a permanent part of the product and should remain with the product even if the product is sold.

Pedi-Mate® is a registered trademark of Ferno Washington, Inc.

## Securing the child restraint with the X-restraint package

To attach the Britax Meridian SICT (series no. 7200/A/2010), Platinum Pro SICT (series no. 7200/A/2013i), and Millenia SICT (series no. 7200/A/2013/i) Convertible Child Restraint to the cot with the X-restraint package (6500-001-430):

1. Lay the cot flat.

2. Open the waist restraint straps (6500-001-402 and 6500-001-403). Lay the straps to the side and out of the way.
3. Position the child restraint to face the foot end of the cot.
4. Place the child restraint in the reclined position.
5. Raise the cot Fowler up to align with the back of the child restraint.
6. Loop the upper anchorage strap with the anchor fitting and attachment clip from the child restraint around the cot Fowler (Figure 30). Pull the adjustment strap to tighten and remove slack.
7. Pull the waist restraint under the siderail and through the bottom of the child restraint (Figure 31).



**Figure 30 – Anchorage strap location**



**Figure 31 – Secure the waist restraint**

8. While firmly pushing down on the seat, pull the waist restraint with your other hand to tighten.
9. Attach one restraint strap (6500-001-404) to the foot end lift bars (Figure 32) or the outer rail (Figure 33).



**Figure 32 – Attach to the foot end lift bars**



**Figure 33 – Attach to the outer rail**

10. Pull the restraint strap (6500-001-404) through the foot end of the child restraint (Figure 34).
11. While firmly pushing down on the seat, pull the restraint with your other hand to tighten.
12. While holding the tension, close the rear facing lock-off on the buckle side (Figure 35).



Figure 34 – Restraint location



Figure 35 – Rear facing lock-off

13. Close the rear facing lock-off on the opposite side.

14. Place the baby into the child restraint and secure per the manufacturer's instructions.

## Attaching the defibrillator platform

**WARNING** - Do not attach the defibrillator platform on a Model 6086 Performance-PRO XT cot with the Power-LOAD option to avoid the risk of a cot tip.

### CAUTION

- Always secure the defibrillator platform to the product when you use the defibrillator platform.
- Always use and adjust the straps that are provided with the defibrillator platform to secure the defibrillator.
- Always change the attachment location or adjust the straps for your specific defibrillator size or shape.
- Do not load the defibrillator platform above the safe working load of 30 lb (13.6 kg).

To attach the defibrillator platform:

1. Place the defibrillator platform in the stored position (Figure 36).
2. Open and expand the defibrillator platform legs (Figure 37).

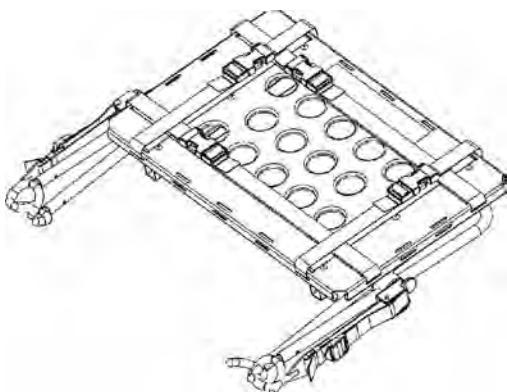


Figure 36 – Stored position

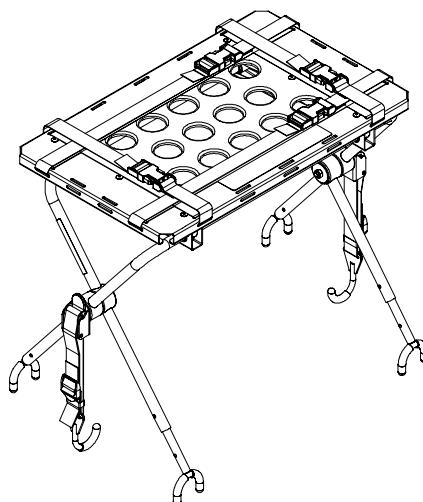


Figure 37 – Open defibrillator platform legs

3. If the product is equipped with an IV pole, raise the IV pole (A) to the up position (Figure 38).
4. Place the defibrillator platform on the product frame.

5. Position the inside legs (B) of the defibrillator platform toward the head end of the product (Figure 38).
6. Place the latch hook (C) under the litter frame or foot end fastener and push the tab (D) up until it locks into place on one side with an audible click (Figure 39). Repeat on the other side. For **Power-LOAD** compatible cots, if equipped, you must lengthen and attach the straps to the foot end fastener (Figure 40).

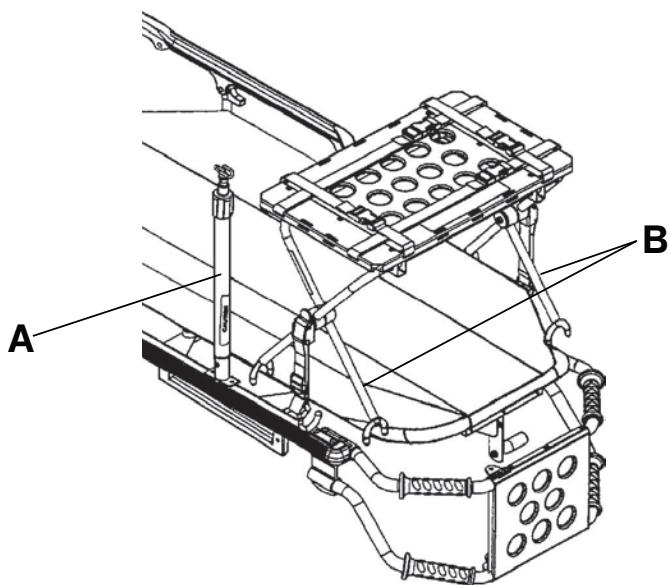


Figure 38 – Raise IV pole and position defibrillator tray (Model 6506 shown)

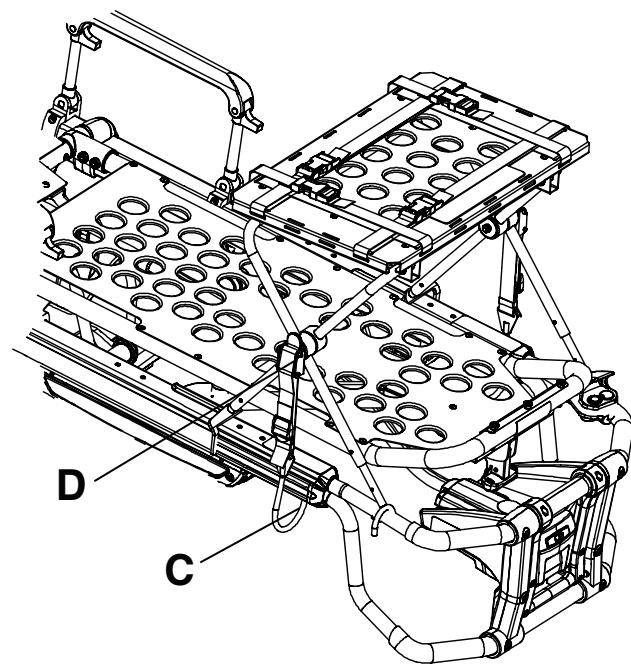


Figure 39 – Latch hook placement (Model 6506 shown)

7. Make sure that the defibrillator platform is secured to the product.
8. Place the defibrillator on the defibrillator platform.
9. Secure the straps (E) to hold the defibrillator on the defibrillator platform (Figure 41).

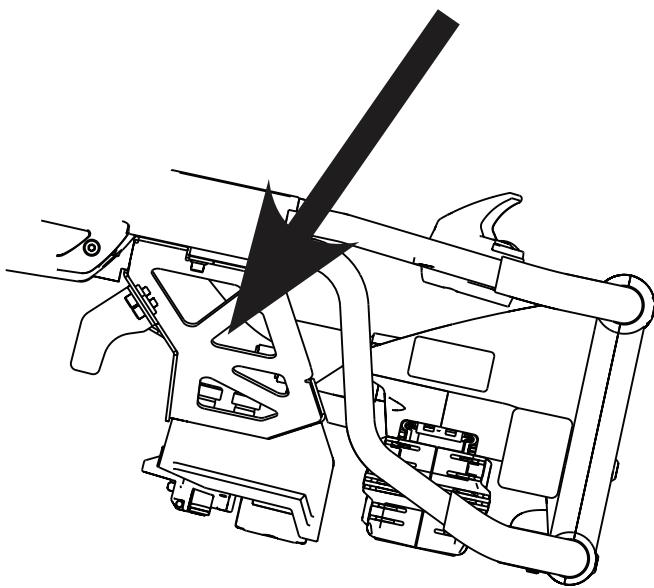


Figure 40 – Tab (Model 6506 shown)

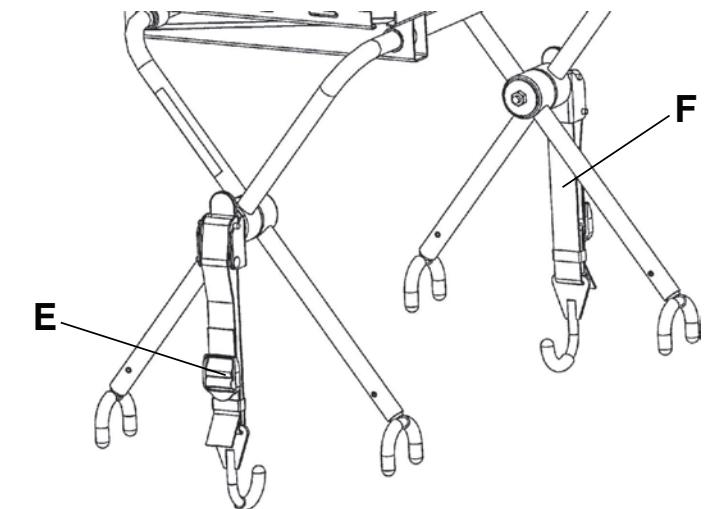


Figure 41 – Attach defibrillator platform to the cot

**Note** - If the defibrillator platform is not attached to the product after you connect both latch hooks, unlatch the tab. To adjust, loosen or tighten the strap and then push the tab up until it locks into place with an audible click.

## Hanging equipment from the equipment hook

Use the equipment hook to hang additional accessories or equipment, such as defibrillators and monitors.

### CAUTION

- Do not load the equipment hook above the safe working load of 35 lb (15.8 kg).
- Always remove all accessories or equipment from the equipment hook when in the vehicle.

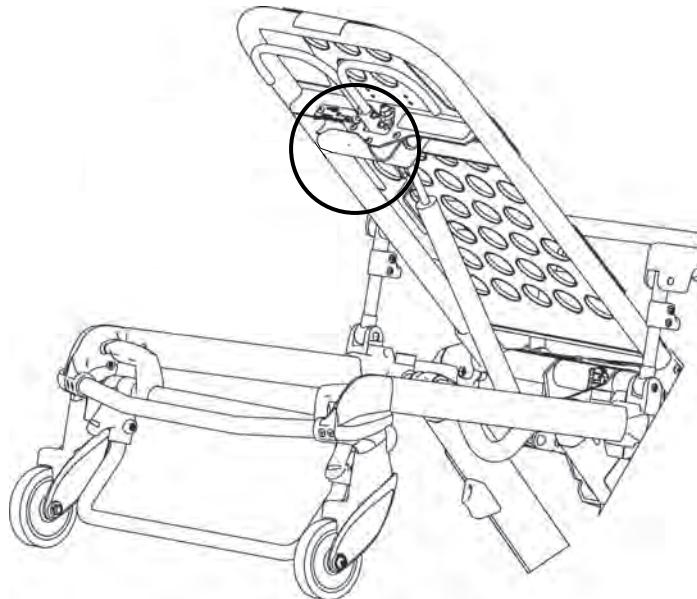


Figure 42 – Equipment hook

## Attaching the head extension with pillow

You can attach the head extension assembly on the backrest to provide head end support.

To attach the pillow to the head extension, place the support into the flap on the bottom of the pillow. Secure the pillow to the **Velcro®** on the bottom of the support.

### Note

- The head extension with pillow (6100-044-000) is not compatible with the equipment hook option (6500-147-000), Fowler oxygen bottle holder option (6500-241-000), or retractable head section oxygen bottle holder option (6085-046-000).
- The head extension pillow is a Type BF applied part.

## Positioning the two-stage IV pole

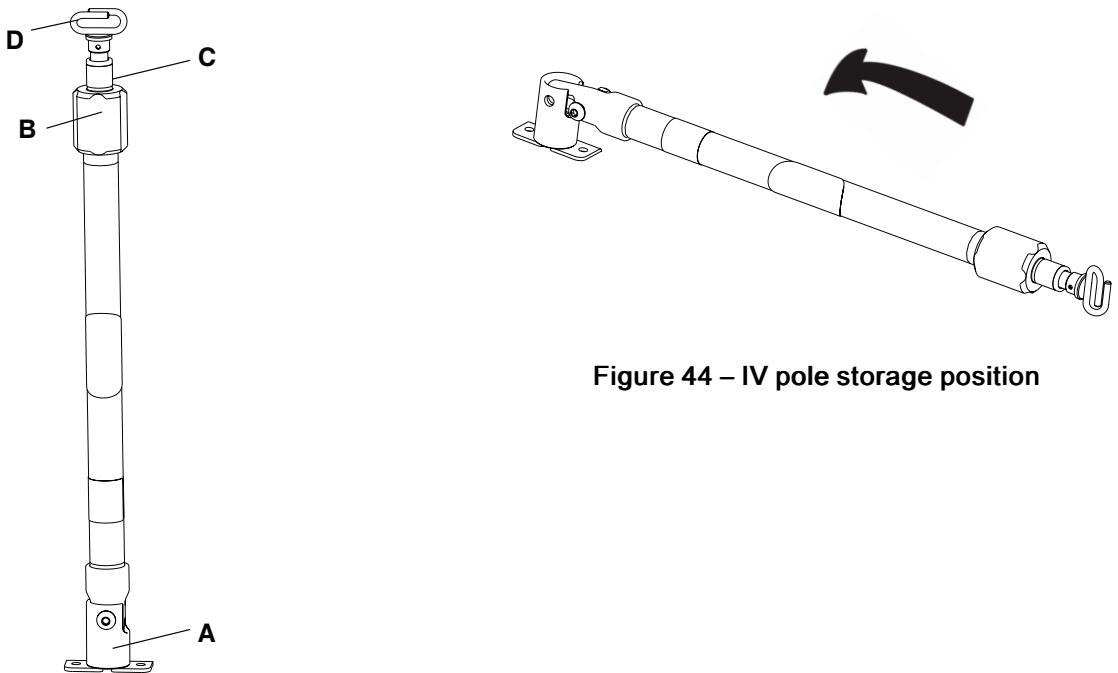
**CAUTION** - Do not load the IV pole above the safe working load of 25 lb (11.3 kg).

To position the IV pole (Figure 43):

1. Lift and pivot the IV pole from the storage position and push down until the IV pole locks into the receptacle (A).
2. To raise the height of the pole, turn the locking collar (B) counterclockwise and pull up on the telescoping portion (C) of the pole to raise it to the desired height.
3. Turn the locking collar (B) clockwise to lock the telescoping portion in place.
4. Hang the IV bags on the IV hook (D).
5. Turn the locking collars (B) counterclockwise and slide section (C) into the bottom tube.

6. Turn the locking collars (B) clockwise to tighten.
7. Lift up and pivot the pole down into the storage position (Figure 44).

**Note** - The dual two-stage IV poles (6500-312-000 or 6550-312-000) are not compatible with either the patient right (6500-310-000 or 6550-310-000) or the patient left (6500-311-000 or 6550-311-000) two-stage IV pole options.



**Figure 44 – IV pole storage position**

**Figure 43 – IV pole raised position**

## Positioning the three-stage IV pole option

**CAUTION** - Do not load the IV pole above the safe working load of 25 lb (11.3 kg).

To position the IV pole (Figure 45):

1. Lift and pivot the IV pole from the storage position and push down until the IV pole locks into the receptacle (A).
2. To raise the height of the pole, turn the locking collar (B) counterclockwise and pull up on the telescoping portion (C) of the pole to raise it to the desired height.
3. Turn the locking collar (B) clockwise to lock the telescoping portion in place.
4. For a higher IV pole, pull up on section (D) until the spring clip (E) connects.
5. Hang the IV bags on the IV hook (F).
6. To lower the IV pole, push in on the spring clip (E) and slide section (D) down into section (C). Turn the locking collar (B) counterclockwise and slide section (C) into the bottom tube.
7. Turn the locking collar (B) clockwise to tighten.
8. Lift up and pivot the pole down into the storage position.

**Note** - The dual three-stage IV poles (6500-317-000 or 6550-317-000) are not compatible with either the patient right (6500-315-000 or 6550-315-000) or the patient left (6500-316-000 or 6550-316-000) three-stage IV pole options.

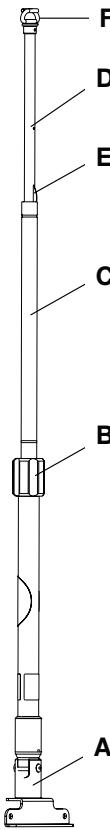


Figure 45 – IV pole raised position

## Attaching an oxygen bottle to the oxygen bottle holder

---

### WARNING

- Do not use the oxygen bottle holder to hold an oxygen bottle holder when the transport vehicle is in motion. Always place the oxygen bottle holder in an appropriate storage location when the transport vehicle is in motion.
- Always inspect the straps and clips for wear between use. Replace the strap if it no longer holds the oxygen bottle.

---

### CAUTION

- Do not load the oxygen bottle holder above the safe working load of 15 lb (6.8 kg).
- Do not use two oxygen bottle holders at the same time.

---

To attach an oxygen bottle to the oxygen bottle holder:

1. Place an oxygen bottle in the holder.
2. Insert the lower strap through the buckle and affix the strap onto itself to secure the oxygen bottle to the holder.

## Attaching an oxygen bottle to the retractable head section oxygen bottle holder

---

**WARNING** - Do not pinch your fingers between the Fowler bracket and the oxygen bottle if your cot is equipped with the retractable head section oxygen bottle holder option.

---

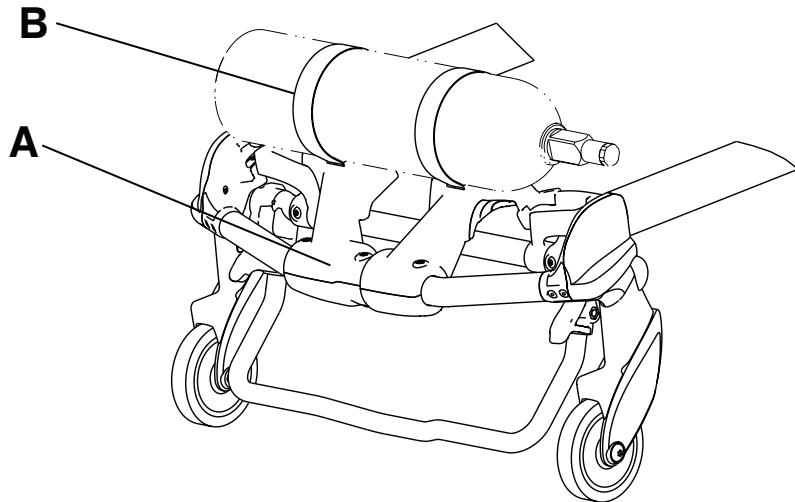
### CAUTION

- Do not load the oxygen bottle holder above the safe working load of 15 lb (6.8 kg).
- Do not use two oxygen bottle holders at the same time.

---

To attach an oxygen bottle to the retractable head section oxygen bottle holder (Figure 46):

1. Center the oxygen bottle on the cradled surface of item (A).
2. Tighten both straps (B) around the oxygen bottle.
3. Secure the slack on the straps to the **Velcro®** on the straps.



**Figure 46 – Oxygen bottle attachment**

**Note**

- The Fowler oxygen bottle holder option (6500-241-000) is not compatible with the retractable head section oxygen bottle holder option (6085-046-000).
- Do not use the oxygen bottle holder to hold an oxygen bottle holder when the transport vehicle is in motion. Always place the oxygen bottle holder in an appropriate storage location when the transport vehicle is in motion.
- Inspect the straps and clips for wear between use. Replace the strap if it no longer holds the oxygen bottle.

## Attaching the base storage net option

---

**CAUTION**

- Do not load the base storage net above the safe working load of 20 lb (9 kg).
- Always be careful when you retract the base to avoid damaging items that are stored in the base storage net.

---

To attach the base storage net, wrap the **Velcro®** straps around the base tubes.

## Attaching the backrest storage pouch

---

**CAUTION**

- Do not load the backrest storage pouch above the safe working load of 20 lb (9 kg).
- Do not allow the storage pouch to interfere with the operation of the retractable head section.

---

To attach the backrest storage pouch (Figure 47):

1. Insert each strap through a hole in the backrest skin.
2. Mount the pouch flat against the backrest.
3. Secure the backrest storage pouch to the cot with the **Velcro®** straps.

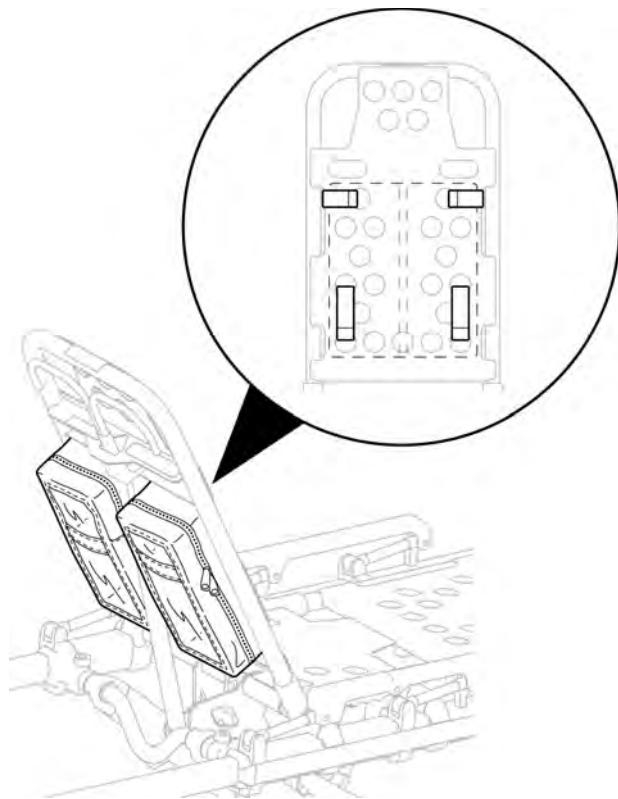


Figure 47 – Backrest storage pouch

## Attaching the head end storage flat option

---

**WARNING** - Do not allow the head end storage flat (if equipped) to interfere with the operation of the retractable head section, safety bar, or vehicle safety hook.

---

---

**CAUTION** - Do not load the head end storage flat above the safe working load of 40 lb (18 kg).

---

To attach the head end storage flat (Figure 48):

1. Install the **Velcro®** straps (A) near the pneumatic cylinder and around the cross tube (C) of the retractable head section.
2. Buckle the restraint straps (B) around the outer rails of the retractable head section.

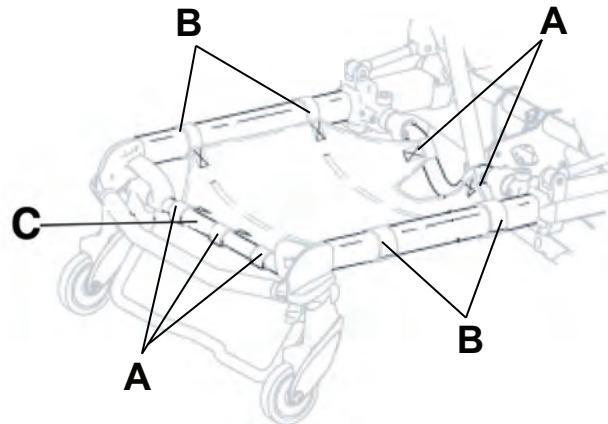


Figure 48 – Head end storage flat

## Attaching the mattress

**CAUTION** - Do not store items under the mattress. Items under the mattress may interfere with product operation.

Two mattress options are available for use with this product. Use the standard Gatch bolster (6500-002-150/6506-002-150) mattress with the standard siderail. Use the wider Gatch bolster mattress (6500-003-130/6506-003-130) with the expandable patient surface (XPS) option.

To attach the mattress to the cot:

1. Align the **Velcro®** on the back of the mattress with the **Velcro®** on the cot litter.
2. Attach the strap at the foot end of the mattress through the two holes in the foot end skin on the cot litter.
3. Pull the strap through the buckle and attach the **Velcro®** to secure the strap.

**Note** - The mattress is a Type BF applied part.

## Inserting a SMRT Pak

The **SMRT** Pak is designed to be compatible with the **Power-PRO XT**, **Power-PRO IT**, and **Power-PRO TL** cots.

To maximize available battery power, only use **SMRT** Paks that have been charged within the last 48 hours.

To insert the **SMRT** Pak:

1. Align the tabs in the battery enclosure.
2. Push the **SMRT** Pak into the enclosure until the latch clicks into place.

The **SMRT** Pak can remain on the **Power-PRO** cot between service calls for up to one week or until the cot battery LED indicator flashes amber.

## Removing a SMRT Pak from the cot

After the **SMRT** Pak has been discharged, remove the **SMRT** Pak from the **Power-PRO** cot and replace it with a charged **SMRT** Pak.

Running the **SMRT** Pak repeatedly, without rest periods, can increase the temperature within the cells and reduce life. For example, lifting a heavy patient up and down several times in rapid succession can reduce the **SMRT** Pak life.

### **WARNING**

- Do not remove the battery when the cot is active.

- Do not attempt to open the battery pack for any reason, to avoid the risk of electric shock. If the battery pack case is cracked or damaged, do not insert it into the charger. Return damaged battery packs to a service center for recycling.
- Always avoid direct contact with a wet battery or battery enclosures. Contact may cause injury to the patient or operator.

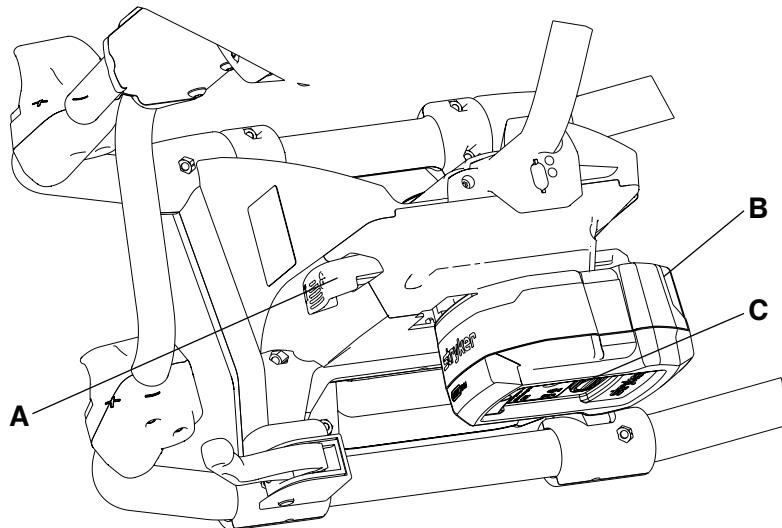
---

**CAUTION** - Always remove the battery if the cot is not going to be used for an extended period of time (more than 24 hours).

---

To remove the **SMRT** Pak from the cot:

1. Press the red one hand release button (C) or press the battery release button (A) to release the **SMRT** Pak (B) from the cot (Figure 49).
2. Slide the released **SMRT** Pak out of the enclosure.



**Figure 49 – Releasing the battery**

## Storing the battery

For the longevity, performance, and safety of this equipment, use the original packaging materials when you store or transport this equipment.

All batteries lose charge during storage or periods of inactivity. A **SMRT** Pak can lose up to 30 percent of its charge within 48 hours after you remove it from the **SMRT** charger. Use and fully charge stored **SMRT** Paks every three months to maintain top performance.

## Charging the **SMRT** Pak

The **SMRT** Pak is intended for use with the **SMRT** charger only.

---

**WARNING** - Do not insert a cracked or damaged **SMRT** Pak into the **SMRT** charger. Return damaged **SMRT** Paks to a service center for recycling.

---

### Note

- For extended storage, store the **SMRT** Pak on the **SMRT** charger to trickle charge. The **SMRT** charger keeps the **SMRT** Pak charged and ready for use.
- Store the **SMRT** Pak at room temperature within the allowable temperature charge range of 43 °F to 88 °F (6 °C to 31 °C). Charging the **SMRT** Pak outside of this recommended temperature range reduces **SMRT** Pak life and extends charge time.

To charge the **SMRT** Pak (Figure 50):

1. Insert a clean, dry **SMRT** Pak into the **SMRT** charger. Make sure that the **SMRT** Pak is locked into the **SMRT** charger.

#### Note

- The **SMRT** charger LED indicator (B) will flash green while charging (Figure 50). The optimum charge time is two hours.
- When the **SMRT** Pak is charged and ready for use, the **SMRT** charger LED indicator (B) turns to solid green.

2. Press the red release button (A) (Figure 50) and slide the **SMRT** Pak to release the charged and ready **SMRT** Pak from the **SMRT** charger.

The **SMRT** charger manages charging regardless of the **SMRT** Pak charge state.

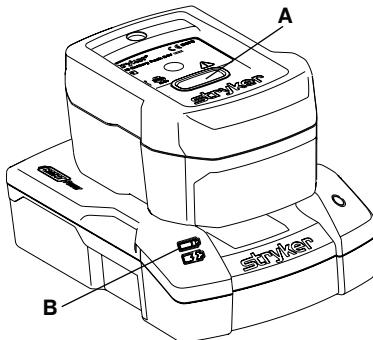


Figure 50 – Charging the **SMRT** Pak

#### Checking the **SMRT** Pak power level with the **SMRT** charger

Use the **SMRT** charger LED indicators to check the **SMRT** Pak power level.

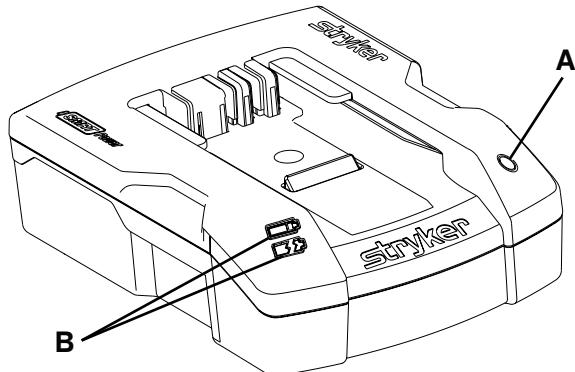


Figure 51 – Checking the **SMRT** Pak power level

- Power connection: Connect or disconnect the **SMRT** charger from the appropriate power source (*Powering the charger* (page 61)).
- **SMRT** charger power LED (A): If the green LED is illuminated, then the **SMRT** charger has power.
- **SMRT** charger LED indicators (B): Green and amber charger LED indicators provide **SMRT** Pak status information. The LEDs may be in a steady or flashing status based on the condition of the **SMRT** charger or **SMRT** Pak.

<b>SMRT</b> charger LED indicator	Status
Green (flashing)	<b>SMRT</b> charger is charging the <b>SMRT</b> Pak. The optimum charge time is two hours.
Green (solid)	<b>SMRT</b> Pak is charged and ready for use

SMRT charger LED indicator	Status
Amber (flashing)	SMRT Pak temperature delay. The <b>SMRT</b> charger is waiting for the <b>SMRT</b> Pak to reach an allowable temperature range of 43 °F to 88 °F (6 °C to 31 °C).
Amber (solid)	SMRT Pak error. See the troubleshooting section of your maintenance manual.

## Electrical power installation requirements

When configuring the electrical power source for **SMRT** charger installation, follow these electrical power requirements for reliable and effective operation.

Power type	Operational voltage range	Frequency	Maximum current draw	Standby current draw	Low voltage shutoff
AC	100 to 240 VAC	50/60 Hz	1.20 A	0.05 A	N/A
DC	12.5 to 16 VDC	N/A	4.16 A	0.20 A	10 VDC

## Installing the SMRT charger

When installing the **SMRT** charger, place the **SMRT** charger in an environmentally controlled location that is:

- Free of excessive dust and moisture
- Kept within a constant temperature range. An allowable temperature range is 43 °F to 88 °F (6 °C to 31 °C). The optimal temperature range is 65 °F to 75 °F (18 °C to 24 °C).
- Readily accessed for use

Locate and maintain the power supply and power cords to minimize the risk of damage and inadvertent disconnections.

## Installing the mounting bracket option

### WARNING

- Always have a certified mechanic, familiar with ambulance vehicle construction, install the mounting bracket option and the **SMRT** charger.
- Always mount the **SMRT** charger to the mounting bracket option in an enclosed cabinet and out of patient reach during transport to comply with established crash test standards.
- Always make sure that the mounting bracket option is securely attached to the surface.

To install the mounting bracket (Figure 52):

1. Use the **SMRT** charger mounting bracket as a template to mark the location of the mounting holes (A) at the area where you will install the mounting bracket.
2. Position the mounting bracket, making sure that the:
  - a. Spring tab (B) is located at the rear of the **SMRT** charger.

**Note** - When mounting the bracket to a vertical surface, the spring tab should be horizontal with the spring tab point to the left (Figure 52).

  - b. Power cord easily plugs into the rear of the **SMRT** charger.
  - c. **SMRT** charger slides from front to back to connect to the bracket after mounting.
  - d. Bracket is installed correctly for the ambulance or station location:

Ambulance location	Station location
<ul style="list-style-type: none"> <li>Secure the bracket to a horizontal structural support surface or shelf using size #10, grade 5 screws minimum (not supplied).</li> <li>Make sure that the selected mounting surface is strong enough to securely hold the <b>SMRT</b> charger and <b>SMRT</b> Pak during transport.</li> <li>Locate the bracket in an enclosed cabinet and out of patient reach during transport.</li> <li>Allow for easy <b>SMRT</b> Pak installation and removal.</li> <li>Locate the power supply within reach of the power cord.</li> </ul>	<ul style="list-style-type: none"> <li>Secure the bracket to a horizontal or vertical structural support surface using size #10, grade 5 screws minimum (not supplied).</li> <li>For vertical installation, position the mounting bracket so the spring tab is directly below the mounting screws, so the <b>SMRT</b> Pak remains supported by the <b>SMRT</b> charger even if the release button is accidentally pressed.</li> <li>Allow for easy <b>SMRT</b> Pak installation and removal.</li> <li>Locate the power supply within reach of the power cord.</li> </ul>

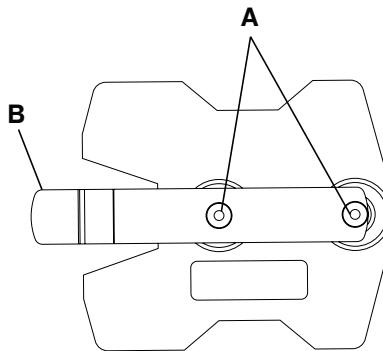


Figure 52 – Mounting bracket

## Attaching the charger onto the mounting bracket option

To attach the **SMRT** charger onto the mounting bracket (Figure 53):

1. Align the rear keyway slots (A) onto the bracket fasteners (B).
2. Slide the **SMRT** charger (C) in until it locks into the mounting bracket (D) to secure the charger to the bracket.

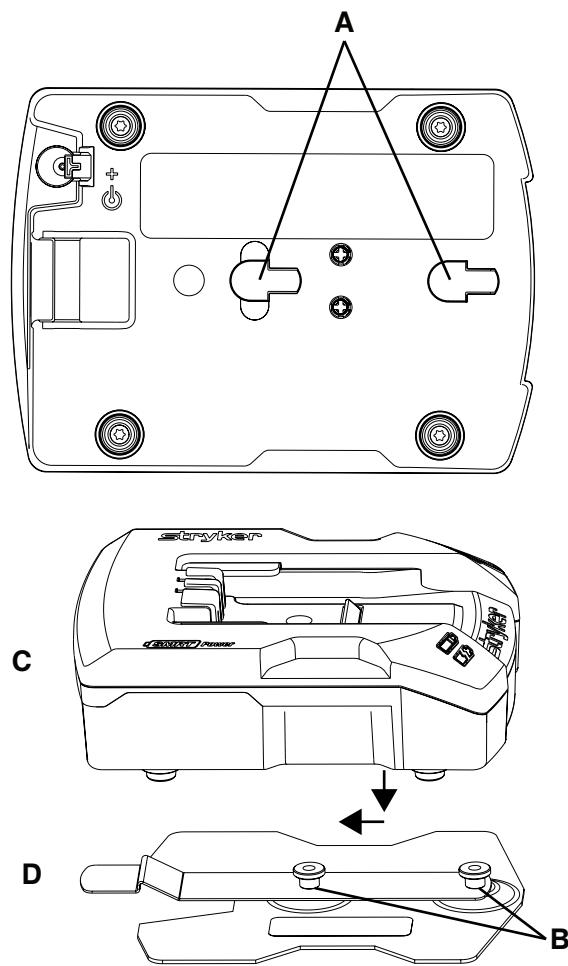


Figure 53 – Attaching the charger

## Powering the charger

### CAUTION

- Always place the electrical **SMRT** charger power cord where it will not be stepped on, tripped over, or otherwise subjected to damage or stress.
- Do not touch the **SMRT** Pak receptacle terminals with metal objects.

To power the **SMRT** charger (Figure 54):

1. Locate the power connection (A) on the back of the **SMRT** charger.
2. Push the power cord retention tab (B) in to insert the power cord outlet connector into the **SMRT** charger power connection.
3. Plug the power adaptor end of the power cord into the power source.

It is a best practice to use a clean, uninterruptible power source. The **SMRT** charger continuously illuminates a solid green power LED when it is connected to a power supply.

Use only Stryker-approved parts to power the **SMRT** charger.

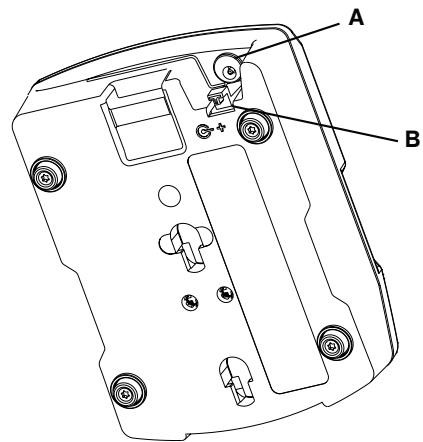


Figure 54 – Powering the charger

## Disconnecting the charger

---

**CAUTION** - Always grasp and pull the plug, not the cord, when you disconnect the **SMRT** charger to avoid the risk of damage to the electrical plug and cord.

---

To disconnect the **SMRT** charger, unplug the power cord from the AC or DC power source.

## Accessories and parts

These accessories may be available for use with your product. Confirm availability for your configuration or region. Call Stryker Customer Service: 1-800-327-0770.

Name	Number
Belt extension	6082-160-050
Defibrillator platform	6506-170-000
Equipment hook	6500-147-000
Head extension with pillow	6100-044-000
IV pole, two-stage, right	6500-310-000
IV pole, two-stage, left	6500-311-000
IV pole, two-stage, dual	6500-312-000
IV pole, three-stage, right	6500-315-000
IV pole, three-stage, left	6500-316-000
IV pole, three-stage, dual	6500-317-000
Mattress, knee Gatch bolster	6506-034-000
Mattress, knee Gatch bolster, grey	6506-033-000
Mattress, knee Gatch bolster, XPS	6500-003-130
Mattress, knee Gatch bolster, XPS, grey	6506-041-000
Oxygen bottle holder, foot end	6500-240-000
Oxygen bottle holder, head end	6500-241-000
Oxygen bottle holder, removable	6080-140-000
Oxygen bottle holder, retractable head section	6085-046-000
Restraint bracket option	6091-300-010
Restraint package, G-rated	6500-002-030
Restraint package, XPR	650600030010
Restraint package, X-restraint	6500-001-430
Restraint package, X-restraint, blue	6500-001-431
Siderail, option	6506-031-000
Siderail, XPS option	6506-040-000
Steer-Lock option	6506-038-000
Storage, backrest pouch	6500-130-000
Storage flat, head end	6500-128-000
Storage net, base	6500-160-000

Use only Stryker-approved parts. Other parts may result in increased electromagnetic emissions or decreased electromagnetic immunity of the system. Do not modify parts. Failure to comply may result in injury.

Name	Number
SMRT charger	6500-201-000
SMRT charger mounting bracket	6500-034-000
SMRT Pak kit, battery pack	6500-700-046
<b>Power components - AC</b>	
Charger power supply	6500-201-148
Power cord, North America	6500-201-149
Power cord, Europe	6500-201-150
Power cord, United Kingdom	6500-201-151
Power cord, Australia	6500-201-153
<b>Power components - DC</b>	
12 VDC cable, automotive	6500-201-147
12-24V cable, DIN plug	6500-201-152
<b>SMRT power kit (includes 1 charger, 2 Paks, and 1 power cord)</b>	
SMRT power kit - 12 VDC, domestic (car charger)	6500-700-040
SMRT power kit - 120 VAC, domestic (wall charger)	6500-700-041
SMRT power kit - 240 VAC, United Kingdom, international	6500-700-043
SMRT power kit - 240 VAC, Europe, international	6500-700-044
SMRT power kit - 240 VAC, Australia, international	6500-700-045

## Cleaning and disinfecting with wipes

For United States only. Confirm availability for your configuration or region. Call Stryker Customer Service: 1-800-327-0770.

Stryker's preferred wipes (2060-000-001 6" x 10" or 2060-000-002 9" x 12") include the following active ingredients:

- n-Alkyl (60% C14, 30% C16, 5% C12, 5% C18) dimethyl benzyl ammonium chloride - 0.154%
- n-Alkyl (68% C12, 32% C14) dimethyl ethylbenzyl ammonium chloride - 0.154%
- Isopropanol - 21.000%

Non-active ingredient: Ethylene Glycol Monobutyl Ether – < 3%

**Note** - For safety information, read the product label.

To clean or disinfect the external product surface:

1. To clean, wipe external surfaces with a fresh, clean wipe to remove all visible soils. Repeat as necessary until the product is clean.

### **Note**

- Use as many wipes as necessary.
- Complete step 1 before you disinfect.

2. To disinfect, wipe external surfaces with a fresh, clean wipe until wet. Allow the external surface to remain wet for two minutes at room temperature.
3. Allow the product to dry before you return it to service.

# Cleaning and disinfecting the XPR restraint straps

Confirm availability for your configuration or region. Call Stryker Customer Service: 1-800-327-0770.

Suggested cleaners include:

- ≤ 70% isopropyl alcohol; or

A cleaner with the following active ingredients (or equivalent):

- Ammonium salts ≤ 0.31%
- Isopropyl alcohol ≤ 21.000%
- Ethylene glycol monobutyl ether ≤ 3.000% (non-active ingredient)

**Note** - Failure to use the prescribed cleaners may cause premature degradation and void the product's warranty. For example, do not clean with bleach, **HDQ Neutral®**, or accelerated hydrogen peroxide. If you have questions or concerns, please reach out to Stryker Customer Service (1-800-327-0770).

Recommended cleaning method:

1. Follow the cleaning solution manufacturer's dilution recommendations exactly.
2. To clean, wipe external surfaces to remove all visible soils. Repeat as necessary until the product is clean.
3. To disinfect, wipe external surfaces until wet.
4. Make sure that the product does not stay wet longer than the chemical manufacturer's guidelines for proper disinfecting.
5. Check functionality before you return the product to service.
  - Immersing restraint strap metal buckles can cause buckle corrosion and is not recommended. Rinse with clean water and allow to air dry to reduce chance of corrosion. Replace restraints if metal buckles are corroded.
  - Direct skin contact with visibly soiled, permeable material may increase the risk of infection.
  - Laundering the restraint straps is not recommended.

---

**CAUTION** - Do not apply lubricants to the surfaces of the restraints.

---

## Note

- XPR restraint straps have a three month expected service life when using the suggested cleaners shown above.
- Failure to follow the above directions when using these types of cleaners may void this product's warranty.
- Always wipe the product with clean water and dry after cleaning. Some cleaning products are corrosive in nature and may cause damage to the product. Failure to properly rinse and dry the product leaves a corrosive residue on the surface of the product and may cause premature degradation of critical components.

# Cleaning

**WARNING** - Always use any appropriate personal protective equipment while power washing to avoid inhaling contagion. Power washing equipment may aerate contamination.

## CAUTION

- Do not steam clean or ultrasonically clean the product.
- Do not exceed 180 °F (82 °C) as the maximum water temperature.
- Do not exceed 1500 psi (103.4 bar) as the maximum water pressure. If you use a hand held wand to wash the product, keep the pressure nozzle at a minimum of 24 in. (61 cm) from the product.
- Always allow to air dry.
- Always remove the battery before you wash the cot.
- Do not clean, service, or perform maintenance while the product is in use.

The product is power washable. The product may show some signs of oxidation or discoloration from continuous washing. No degradation of the product's performance will occur from power washing as long as you follow the proper procedures.

- Follow the cleaning solution manufacturer's dilution recommendations exactly.
- The preferred method Stryker Medical recommends for power washing the product is with the standard hospital surgical cart washer or hand held wand unit.
- Clean the cot once a month.
- Clean **Velcro®** after each use. Saturate **Velcro®** with disinfectant and allow disinfectant to evaporate. Appropriate disinfectant for nylon **Velcro®** should be determined by the service.
- Immersing restraint strap metal buckles can cause buckle corrosion and is not recommended. Rinse with clean water and allow to air dry to reduce chance of corrosion. Replace restraints if metal buckles are corroded.
- Direct skin contact with visibly soiled, permeable material may increase the risk of infection.

## Suggested cleaners

In general, when used in concentrations recommended by the manufacturer, either phenolic type or quaternary (excluding **Virex® TB**) type disinfectants can be used. Iodophor type disinfectants are not recommended for use because staining may occur.

Suggested cleaners include:

- Quaternary cleaners (active ingredient - ammonium chloride) that contain less than 3% glycol ether
- Phenolic cleaners (active ingredient - o-phenylphenol)
- Chlorinated bleach solution (5.25% - less than 1 part bleach to 100 parts water)
- ≤ 21% isopropanol alcohol

Avoid oversaturation. Do not allow the product to stay wet longer than the chemical manufacturer's guidelines for proper disinfecting.

## Note

- Failure to follow the above directions when using these types of cleaners may void this product's warranty.
- Always wipe the product with clean water and dry after cleaning. Some cleaning products are corrosive in nature and may cause damage to the product. Failure to properly rinse and dry the product leaves a corrosive residue on the surface of the product and may cause premature corrosion of critical components.

## Cleaning the charger

---

### WARNING

- Always wear insulated rubber gloves, in addition to personal protective equipment, when cleaning the **SMRT** Pak to reduce the risk of injury.
- Always disconnect the **SMRT** charger from the wall outlet before cleaning to avoid the risk of electrical hazards.
- Do not spray fluid directly onto the **SMRT** charger.
- Do not power wash the **SMRT** charger.
- Do not use solvents, lubricants, or other chemicals to clean the **SMRT** charger unless otherwise directed.
- Do not immerse the **SMRT** charger in water or allow water to collect on top of the **SMRT** charger to avoid the risk of electric shock.

---

To clean the **SMRT** charger:

1. Disconnect the **SMRT** charger from the wall outlet to avoid electrical hazards during cleaning.
2. Wipe surfaces of the **SMRT** charger with a soft cloth dampened with a non-abrasive, hospital disinfectant.
3. Wipe with a cloth moistened with clean water to remove any cleaning chemicals or residue.
4. Dry thoroughly before placing the **SMRT** charger back into service.

## Cleaning the battery

The **SMRT** Pak is designed to be power washable. The preferred method for power washing the **SMRT** Pak is with the standard hospital surgical cart washer or hand held wand unit.

---

### WARNING

- Always use any appropriate personal protective equipment while power washing to avoid inhaling contagion. Power washing equipment may aerate contamination.
- Always wear insulated rubber gloves, in addition to personal protective equipment, when cleaning the **SMRT** Pak to reduce the risk of injury.
- Always use only non-conductive materials to wipe the **SMRT** Pak.
- Always avoid excessive water exposure to the **SMRT** Pak terminals.
- Always refer to the disinfectant's Material Safety Data Sheet (MSDS) to verify the pH range. Disinfectants with pH levels higher than 10.5 may cause the **SMRT** Pak housing material to crack.
- Do not directly handle or make contact with the **SMRT** Pak terminals while cleaning to avoid the risk of injury.
- Do not immerse the **SMRT** Pak in liquid to reduce the risk of electric shock.
- Do not use solvents, lubricants, or other chemicals to clean the **SMRT** Pak unless otherwise directed.

---

### CAUTION

- Do not steam clean or ultrasonically clean the **SMRT** Pak.
- Do not exceed 180 °F (82 °C) as the maximum water temperature.
- Do not exceed 240 °F (115 °C) as the maximum air dry temperature (cart washers).
- Do not exceed 1500 psi (103.4 bar) as the maximum water pressure. If you use a hand held wand to wash the product, keep the pressure nozzle at a minimum of 24 in. (61 cm) from the product.

---

To clean the **SMRT** Pak:

1. Remove the **SMRT** Pak from the **Power-PRO** cot or **SMRT** charger.
2. Inspect the **SMRT** Pak housing and terminal area for any cracks or damage.
3. Clean the **SMRT** Pak with a hospital grade disinfectant with a pH range of 6.5 to 10.5.
4. Rinse the **SMRT** Pak thoroughly with clean water to remove any cleaning chemical or residue. Position the **SMRT** Pak to avoid water from pooling near the terminals.
5. Dry the **SMRT** Pak thoroughly before insert the **SMRT** Pak into a **Power-PRO** cot or **SMRT** charger.

# Preventive maintenance

## WARNING

- Always relieve pressure before you disconnect hydraulic or other lines. Escaping fluid under pressure can penetrate the skin and cause serious injury. Tighten all connections before you apply pressure. If an accident occurs, see a doctor immediately.
- Do not use bare hands to check for hydraulic leaks.

## CAUTION

- Always use authorized parts to avoid the risk of product damage.
- Always check hoses and lines regularly to avoid damage to the cot. Check and tighten loose connections. Hydraulic lines, hoses, and connections can fail or loosen due to physical damage, kinks, age, and environment exposure.
- Do not tip the cot onto its load wheels and actuate the product as this will allow air to enter the hydraulic system.

Establish and follow a maintenance schedule and keep records of the maintenance activity. Remove product from service before you perform the preventive maintenance inspection. You may need to perform preventive maintenance checks more often based on your level of product usage. Service only by qualified personnel.

When using maintenance products, follow the directions of the manufacturer and reference all material safety data sheets (MSDS).

## Lubrication

**CAUTION** - Do not lubricate the bearings in the X-frame as it will degrade the performance of the cot and may void its warranty.

The cot has been designed to operate without the need for lubrication.

## Regular inspection and adjustments

The following schedule is a general guide to maintenance. Factors such as weather, terrain, geographical location, and individual usage will alter the required maintenance schedule. If you are unsure how to perform these checks, contact your Stryker service technician. If you are in doubt as to what intervals to follow to maintain your product, consult your Stryker service technician. Check each routine and replace worn parts if necessary.

### Every month or two hours

Inspect these items every month or two hours, whichever comes first.

Item	Inspect
Settings	In-fastener shutoff configuration
Cylinder	Extend cylinder rod. Wipe the cylinder rod with a soft cloth and household cleaner.
Cables and wires	No hanging wires from routings or connections
Manual backup release handle	Manual backup release handle functions
Litter	Frame and litter
Base	Frame and base
Wheels	All wheels are secure, roll, and swivel
Head section	Safety bar operates. Pull toward the head section to make sure that the safety bar swings and rotates freely and pulls back to the home position

Item	Inspect
Restraint	Restraints function with no excessive wear (such as a bent or broken receiver or latch plate or torn or frayed webbing)
Battery	<b>SMRT</b> Pak housing and terminal area for cracks or damage before first and every use
Charger	<b>SMRT</b> charger and parts for cuts in the cord, bent pins or contacts, or cracks in the housing before first and every use

## Every three months or six hours

Inspect these items every three months or six hours, whichever comes first.

Item	Inspect
Cylinder	All fasteners are secure
	No hydraulic fluid (red) leaks
	Loose fittings - tighten, if necessary
Hydraulics	Motor mount fasteners are secure
	No hydraulic fluid leaks
	No leaks from reservoir
Cables and wires	No damage or pinching of wiring harness, cable, or lines
	No damaged connectors
Manual backup release handle	Base extends and retracts when you pull the manual backup release handle
	Cot does not lower when you pull the manual backup release handle with 100 lb (45 kg) or more on the cot
Litter	All fasteners are secure
	Backrest cylinder operates
	Adjust pneumatic cylinder for full range of motion, if required
Base	All fasteners are secure
X-frame	X-frame expands and retracts
Kickstand (optional)	Retracts fully to the transport position
	Bolts are tightened
Head section	All fasteners are secure
	Head section extends and locks
Accessories and parts (optional)	All accessories and parts operate (such as IV pole, head extension and pillow, oxygen bottle holder, and restraint extender)

## Every six months or 12 hours

Inspect these items every six months or 12 hours, whichever comes first.

Item	Inspect
Hydraulics	Hoses and fittings for damage or wear
	Hydraulic velocity fuse - place a weight of approximately 50 lb (23 kg) on the cot, raise the cot, lift the cot with two operators, pull the manual backup release handle, rapidly set the cot down, and make sure that the cot does not drop
Electronic controls	Extend cot to raised position, measure and check load height
	Jog function operates
	High speed retract works
Switches	No damage or wear to either switch
	Both switches operate
Litter	No bent, broken, or damaged components
	No damage or tears on cot grips
	Siderails operate and latch
	Foot rest operates
Mattress	No cracks or tears
Base	No bent, broken, or damaged components
	Cot retaining post is secure. If not, replace the screw
	No excessive damage to X-frame guards
Wheels	Free of debris
Head section	No bent, broken, or damaged components
	Grip bar has no excessive damage or tears
	Load wheels are secure and roll
Kickstand (optional)	Lubricate the kickstand spring and internal spring housing (optional) using <b>Tri-Flow®</b> lubrication.

## Every 12 months or 24 hours

Inspect these items every 12 months or 24 hours, whichever comes first.

Item	Inspect
Settings	Cot and fastener fit and function
	Safety bar connects to the vehicle safety hook
Cylinder	Cylinder is adjusted - lock nut is tight and the cot stops moving when it hits the dead stops
Manual backup release handle	Returns to the stowed position

Item	Inspect
Litter	All welds are intact, not cracked, or broken
	Warning labels present, legible
Base	All welds are intact, not cracked, or broken
Wheels	Check and adjust wheel locks
Retractable head section oxygen bottle holder (optional)	Straps and clips for wear
Defibrillator platform (optional)	Straps not frayed or torn
	Latch hooks are intact and secure

## Foot end fastener part replacement schedule

For **Performance-LOAD** compatible cots, you must replace the foot end fastener parts every 18,078 calls. This is to make sure that the **Performance-LOAD** remains functional. Follow this call volume time table to remain compliant with this requirement.

Calls per day	Months
≤ 7	Not applicable
8	77
9	67
10	59

## Wireless notifications

For products equipped with optional wireless communication technology, these statements apply to the countries as indicated:

Country	Notification
Thailand	<div style="border: 1px solid black; padding: 10px; text-align: center;"><p>นสท.</p><p>เครื่องวิทยุคมนาคมนี้ ได้รับยกเว้น ไม่ต้องได้รับใบอนุญาตให้มี ใช้ซึ่งเครื่องวิทยุคมนาคม หรือตั้งสถานีวิทยุคมนาคมตามประกาศ กสทช. เรื่อง เครื่องวิทยุคมนาคม และสถานีวิทยุคมนาคมที่ได้รับยกเว้นไม่ต้องได้รับใบอนุญาต วิทยุคมนาคมตามพระราชบัญญัติวิทยุคมนาคม พ.ศ. 2498</p><p> กสทช.   กองคบคมนาคม กำกับดูแลเพื่อประชาชน Call Center 1200 (กีรฟรี)</p></div>

# EMC information

## CAUTION

- The use of accessories, transducers, and cables, other than those specified or provided by the manufacturer, could result in increased electromagnetic emissions or decreased electromagnetic immunity and result in improper operation.
- The emissions characteristics of this equipment make it suitable for use in industrial areas and hospitals (CISPR 11 class A). If it is used in a residential environment, for which CISPR 11 class B is normally required, this equipment might not offer adequate protection to radio frequency communication services. The user might need to take mitigation measures, such as relocating or reorienting the equipment.

Guidance and manufacturer's declaration - electromagnetic emissions		
Power-PRO and SMRT charger are intended for use in the electromagnetic environment specified below. The customer or the user of Power-PRO and SMRT charger should assure that they are used in such an environment.		
Emissions test	Compliance	Electromagnetic environment
RF Emissions CISPR 11	Group 1	Power-PRO and SMRT charger use RF energy only for its internal function. Therefore, its RF emissions are very low and are not likely to cause any interference in nearby electronic equipment.
RF Emissions CISPR 11	Group 2	Power-PRO with the Power-LOAD compatibility option must emit electromagnetic energy in order to perform its intended function. Nearby electronic equipment may be affected.
RF Emissions CISPR 11	Power-PRO: Class A  SMRT charger (6500-201-010): Class B	Power-PRO is suitable for use in all establishments other than domestic and those directly connected to the public low-voltage power supply network that supplies buildings used for domestic purposes.  The SMRT charger is suitable for use in all establishments, including domestic establishments and those directly connected to the public low-voltage power supply network that supplies buildings used for domestic purposes.
Harmonic Emissions IEC 61000-3-2	Power-PRO: N/A SMRT charger (6500-201-010): Class A	The SMRT charger is suitable for use in all establishments, including domestic establishments and those directly connected to the public low-voltage power supply network that supplies buildings used for domestic purposes.
Voltage Fluctuations Flicker Emissions IEC 61000-3-3	Power-PRO: N/A SMRT charger (6500-201-010): complies	The SMRT charger is suitable for use in all establishments, including domestic establishments and those directly connected to the public low-voltage power supply network that supplies buildings used for domestic purposes.

## CAUTION

- Portable RF communications equipment, including peripherals such as antenna cables and external antennas, should be used no closer than 12 inches (30 cm) to any part of Power-PRO and SMRT charger, including cables specified by the manufacturer.

- Avoid stacking or placing other equipment adjacent to **Power-PRO** and **SMRT** charger to prevent improper operation of the products. If such use is necessary, carefully observe **Power-PRO** and **SMRT** charger and the other equipment to make sure that they are operating properly.

<b>Recommended separations distances between portable and mobile RF communications equipment and Power-PRO and SMRT charger</b>
---

**Power-PRO** and **SMRT** charger are intended for use in an electromagnetic environment in which radiated RF disturbances are controlled. The customer or the user of **Power-PRO** and **SMRT** charger can help prevent electromagnetic interferences by maintaining a minimum distance between portable and mobile RF communications equipment (transmitters) and **Power-PRO** and **SMRT** charger as recommended below, according to the maximum output power of the communications equipment.

<b>Rated maximum output power of transmitter</b>  W	<b>Separation distance according to frequency of transmitter</b>  m		
	<b>150 kHz to 80 MHz</b>  $D=(1.2) (\sqrt{P})$	<b>80 MHz to 800 MHz</b>  $D=(0.35) (\sqrt{P})$	<b>800 MHz to 2.7 GHz</b>  $D=(0.70) (\sqrt{P})$
0.01	0.12	0.04	0.07
0.1	0.38	0.11	0.22
1	1.20	0.35	0.70
10	3.79	1.11	2.21
100	12	3.50	7

For transmitters rated at a maximum output power not listed above, the recommended separation distance d in meters (m) can be estimated using the equation applicable to the frequency of the transmitter, where P is the maximum output power rating of the transmitter in watts (W) according to the transmitter manufacturer. Note 1: At 80 MHz and 800 MHz, the separation distance for the higher frequency range applies. Note 2: These guidelines may not apply in all situations. Electromagnetic propagation is affected by absorption and reflection from structures, objects, and people.

<b>Guidance and manufacturer's declaration - electromagnetic immunity</b>			
<b>Power-PRO</b> and <b>SMRT</b> charger are suitable for use in the electromagnetic environment specified below. The customer or the user of <b>Power-PRO</b> and <b>SMRT</b> charger should assure that they are used in such an environment.			
<b>Immunity test</b>	<b>IEC 60601 test level</b>	<b>Compliance level</b>	<b>Electromagnetic environment-guidance</b>
Electrostatic discharge (ESD)  IEC 61000-4-2	$\pm 8$ kV contact  $\pm 15$ kV air	$\pm 8$ kV contact  $\pm 15$ kV air	Floors should be wood, concrete or ceramic tile. If floors are covered with synthetic material, the relative humidity should be at least 30%.
Electrostatic fast Transient/burst  IEC 61000-4-4	$\pm 2$ kV for power supply lines  $\pm 1$ kV for input/output lines	<b>Power-PRO: N/A</b>  <b>SMRT charger (6500-201-010):</b> $\pm 2$ kV for power supply lines  $\pm 1$ kV for input/output lines	Mains power quality should be that of a typical commercial or hospital environment.

Guidance and manufacturer's declaration - electromagnetic immunity			
Surge IEC 61000-4-5	<p><math>\pm 1</math> kV line(s) to line(s)</p> <p><math>\pm 2</math> kV line(s) to earth</p>	<p><b>Power-PRO:</b> N/A</p> <p><b>SMRT charger (6500-201-010):</b></p> <p><math>\pm 1</math> kV line(s) to line(s)</p> <p><math>\pm 2</math> kV line(s) to earth</p>	Mains power quality should be that of a typical commercial or hospital environment.
Voltage dips, voltage variations and short interruptions on power supply input lines IEC 61000-4-11	<p>0% <math>U_T</math> for 0.5 cycle at <math>0^\circ</math>, <math>45^\circ</math>, <math>90^\circ</math>, <math>135^\circ</math>, <math>180^\circ</math>, <math>225^\circ</math>, <math>270^\circ</math>, and <math>315^\circ</math></p> <p>0% <math>U_T</math> for 1 cycle</p> <p>70% <math>U_T</math> (30% dip in <math>U_T</math>) for 25 cycles</p> <p>0% <math>U_T</math> for 250 cycles</p>	<p><b>Power-PRO:</b> N/A</p> <p><b>SMRT charger (6500-201-010):</b> 0% <math>U_T</math> for 0.5 cycle at <math>0^\circ</math>, <math>45^\circ</math>, <math>90^\circ</math>, <math>135^\circ</math>, <math>180^\circ</math>, <math>225^\circ</math>, <math>270^\circ</math>, and <math>315^\circ</math></p> <p>0% <math>U_T</math> for 1 cycle</p> <p>70% <math>U_T</math> (30% dip in <math>U_T</math>) for 25 cycles</p> <p>0% <math>U_T</math> for 250 cycles</p>	Mains power quality should be that of a typical commercial or hospital environment. If the user of the <b>SMRT</b> charger requires continued operation during power main interruptions, it is recommended that the device be powered from an uninterrupted power supply or a battery.
Power frequency (50/60Hz) magnetic field IEC 61000-4-8	30 A/m	30 A/m	Power frequency magnetic fields should be at levels characteristic of a typical location in a typical commercial or hospital environment.
Electrical transient conduction along supply lines ISO 7637-2	per ISO 7637-2	<p><b>Power-PRO:</b> N/A</p> <p><b>SMRT Charger (6500-201-010):</b> per ISO 7637-2</p>	N/A

**Note:**  $U_T$  is the a.c. mains voltage before applications of the test level.

Guidance and manufacturer's declaration - electromagnetic immunity			
Conducted RF IEC 61000-4-6	3 Vrms 6 Vrms in ISM and amateur radio bands 150kHz to 80MHz	3 V 6 Vrms in ISM and amateur radio bands	<p>Portable and mobile RF communications equipment should be used no closer to any part of <b>Power-PRO</b> or <b>SMRT</b> charger, including cables, than the recommended separation distance calculated from the equation appropriate for the frequency of the transmitter.</p> <p>Recommended separation distance</p> $D=(1.2) (\sqrt{P})$ $D=(.35) (\sqrt{P})$ <p>80 MHz to 800 MHz</p> $D=(0.70) (\sqrt{P})$ <p>800 MHz to 2.7 GHz</p> <p>where <math>P</math> is the maximum output power rating of the transmitter in watts (W) according to the transmitter manufacturer and <math>d</math> is the recommended separation distance in meters (m).</p> <p>Field strengths from fixed RF transmitters, as determined by an electromagnetic site <sup>a</sup> should be less than the compliance level in each frequency range.<sup>b</sup></p> <p>Interference may occur in the vicinity of equipment marked with the following symbol:</p> 
Radiated RF IEC 61000-4-3	10 V/m 80 MHz to 2.7 GHz	10 V/m	

## Guidance and manufacturer's declaration - electromagnetic immunity

**Note 1:** At 80 MHz and 800 MHz, the higher frequency range applies.

**Note 2:** These guidelines may not apply in all situations. Electromagnetic propagation is affected by absorption and reflection from structures, objects, and people.

**Note 3:** The ISM (industrial, scientific and medical) bands between 0.15 MHz and 80 MHz are 6.765 MHz to 6.795 MHz; 13.553 MHz to 13.567 MHz; 26.957 MHz to 27.283 MHz; and 40.66 MHz to 40.70 MHz. The amateur radio bands between 0.15 MHz and 80 MHz are 1.8 MHz to 2.0 MHz, 3.5 MHz to 4.0 MHz, 5.3 MHz to 5.4 MHz, 7 MHz to 7.3 MHz, 10.1 MHz to 10.15 MHz, 14 MHz to 14.2 MHz, 18.07 MHz to 18.17 MHz, 21.0 MHz to 21.4 MHz, 24.89 MHz to 24.99 MHz, 28.0 MHz to 29.7 MHz and 50.0 MHz to 54.0 MHz.

<sup>a</sup> Field strengths from fixed transmitters, such as base stations for radio (cellular/cordless) telephones and land mobile radios, amateur radio, AM and FM radio broadcast, and TV broadcast cannot be predicted theoretically with accuracy. To assess the electromagnetic environment due to fixed RF transmitters, an electromagnetic site survey should be considered. If the measured field strength in the location in which **Power-PRO** is used exceeds the applicable RF compliance level above, the **Power-PRO** system should be observed to verify normal operation. If abnormal performance is observed, additional measures may be necessary, such as reorienting or relocating **Power-PRO**.

<sup>b</sup> Over the frequency range 150 kHz to 80 MHz, field strengths are less than 10 V/m.



# stryker



Stryker Medical  
3800 E. Centre Avenue  
Portage, MI 49002  
USA