

P/N 1122481 Rev. F



Electric Potato Trailer System

READ BEFORE INSTALLING

PO BOX 713 = 2309 SHUR-LOK STREET = YANKTON, SD 57078-0713 PHONE 1-800-4-SHUR-LOK (1-800-474-8756) = FAX 605-665-0501 www.shurco.com

SHOP ONLINE: www.shopshurco.com

SHIPPING. Orders are shipped F.O.B.

from the Shur-Co®, LLC sites listed below. No full freight is allowed or prepaid shipment accepted unless quoted and approved in writing prior to acceptance of the order. All shipments are made by the most reasonable means in accordance with size and weight of order, unless specified routing instructions are furnished by the customer. Shipments are made daily via U.P.S. and common carrier. Claims for shortages must be made within 10 days. All claims for damages or loss in transit must be made with the carrier. No collect calls will be accepted. To ensure delivery of orders, we need your full street address and phone number. When you receive your shipment, examine it carefully. Be sure all cartons listed on the delivery sheet are accounted for. Large items may be packaged separately. If a carton is damaged, open it and inspect the contents before signing for delivery. If merchandise is damaged, describe damage on the delivery receipt. Failure on your part to document damaged or missing merchandise on the delivery receipt releases the carrier of all liability; repair or replacement will be the customer's responsibility.

WARRANTY. We warrant all new products are free of defects in materials and workmanship.* This warranty is effective if products are properly installed and used for the purpose for which they were intended and applies to the original buyer only. Except as set forth above or in any product-specific warranty documentation, we make no other warranties, express or implied, including but not limited to warranties of merchantability of fitness for a particular use.

Returns of a product for warranty must be accompanied by a Return Merchandise Authorization number (RMA#), obtained by by calling Customer Service at 866-748-7435, and sent, with freight paid by us, to Shur-Co®, LLC, 2309 Shur-Lok St., PO Box 713, Yankton, SD 57078. All products returned without an RMA# will be refused. When we issue the RMA#, we will also issue a call tag to have UPS (or other freight company) pick up the product. C.O.D. returns not accepted. We will pay no storage fees for a warranty product return prior to pick by us or the freight company. If a warranty product return is scheduled to be picked up by us, we will pick up the product at our earliest convenience.

If a product returned is found, in our judgement, to be defective in material or workmanship, our obligation under this warranty is limited to the repair or replacement of the product, which will be made by us. Repair or replacement will be at our discretion, with replacements being made using current products performing in the equivalent function. Labor charges, other than those incurred at our factory, including, but not limited to, any labor to install a repaired or replacement product, are not covered under this warranty. All expenses associated with delivering defective products to our factory and delivering repaired or replacement products from our factory to the owner will be paid by us.

If the product returned is found, in our judgement, to be non-warrantable, the owner will be contacted to authorize repair work, purchase of a replacement product or return of the product, all of which will be at the owner's expense. Payment authorization must be received by us before any non-warrantable product is repaired, replaced or returned. All expenses associated with delivering the repaired non-warrantable product, a replacement product or the non-warrantable product from our factory to the owner will be paid by the owner.

In no event will we be liable for any damages of any kind to person, product or property, including but not limited to indirect, incidental, special, consequential or punitive damages, or damages for loss of profits or revenue, even if we have been advised of the possibility of such damages. There are no warranties for used products or products that have been repaired, altered, modified or subjected to misuse, negligence or accident. We will not repair or replace products that fail or malfunction due to ordinary wear and tear, except as expressly noted in a product-specific warranty. Use of non-Shur-Co®, LLC parts in conjuction with Shur-Co®, LLC products will void this product warranty.

*Certain products have specific warranties that differ from this warranty, for example motors and electronics. Product-specific warranty documentation is available for these items. In the event of a conflict between this warranty and a product-specific warranty, the product-specific warranty will govern.

RETURN POLICY. All sales final. See WARRANTY above for return details.

OTHER. All prices, product listings, sizes, weights and manufacturing details are subject to change without notice. No person is authorized to modify the foregoing conditions of sale whatsoever.

SHUR-CO®, LLC SERVICE AND DISTRIBUTION CENTERS

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ShurTite™ Service Centers

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For more info, log on to our website:

www.shurco.com

MESSAGE TO OWNERS

Thank you for buying this tarping system from Shur-Co®. We appreciate your confidence in our products. Please read and thoroughly understand this manual before installing and/or operating this system.

Pay particular attention to important safety and operating instructions, as well as warnings and cautions. The hazard symbol **\(\Lambda \)** is used to alert users to potentially hazardous conditions and is followed by caution, warning or danger messages.

Failure to READ AND FOLLOW INSTRUCTIONS could result in failure of your tarping system and/or personal injury. Your trailer requirements may, however, call for minor variations to these instructions.

Please inspect your tarping system periodically, repair or replace worn or damaged parts.

QUESTIONS? CALL OUR HELP LINE:

1-866-748-7435

MON-FRI 8 AM-5 PM CENTRAL TIME

SAFETY

We at Shur-Co® are concerned with your safety and the safety of all those operating this system. Therefore, we have provided safety decals at various locations on your tarping system. Keep decals as clean as possible at all times. Replace any decal that has become worn or damaged, painted over or otherwise difficult to read. Replacement decals are available through Shur-Co® dealers.

SAFETY INSTRUCTIONS

- 1. Always wear safety glasses during installation and operation.
- 2. Keep body and clothing clear of moving parts.
- 3. Hold crank firmly with both hands while opening and closing tarp.
- 4. Place safety decals in visible locations. Replace worn or damaged decals.
- 5. No other use of this system is authorized, except as designed.

RUST PREVENTION

To prevent rust, paint all exposed metal, such as weld seams and/or metal exposed by grinding or cutting, with corrosion-resistant paint.

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TOOLS REQUIRED

- 1. Welder
- 2. Hammer
- 3. #2 Phillips Screw Driver Bit
- 4. #3 Phillips Screw Driver Bit
- 5. Air or Electric Impact Wrench w/9/16" Socket
- 6. 9/16" Combination Wrench
- 7. 13/32" Drill (for std. 3/8" bolts)
- 8. 11/32" Drill Bit (for roll return eye bolts)
- 9. 3/16" Drill Bit (for stretch cords)
- 10. 5/16" Drill Bit (for 3/8" self-tapping screws & snap ring)
- 11. 3/8" Drill Bit (for regular 3/8" hex bolts)
- 12. C-Clamps
- 13. 1/4" Drill Bit (for 5/16" self-tapping screws & 1/4" rivet drive)
- 14. 13/64" Drill Bit (for box hooks)



1704367 - Cap Screw - #10 x 3/4"



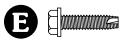
1704768 - Self-Drilling Screw - 1/4" x 3/4"



1700398 - Self-Drilling Screw - 1/4" x 3/4"



1700403 - Self-Tapping Screw - 1/4" x 3/4"



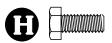
1704338 - Self-Tapping Screw -1/4" x 1"



1704353 - Self-Drilling Screw -1/4" x 1"



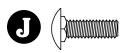
1704260 - Cap Screw -1/4" x 2"



1701045 - Cap Screw - 5/16" x 3/4"

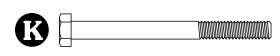


1702926 - Cap Screw - 5/16" x 7/8"



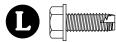
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1704237 - Carriage Bolt - 5/16" x 1"



1201022 - Cap Screw - 5/16" x 3 1/2"

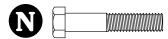
NOTE: Throughout this manual, where 3/8" x 1" self-tapping screws **●** are used with lock washers & and nuts &, use washers and nuts if possible, and drill 13/32" holes. Self-tapping screws used without washers and nuts require a minimum wall thickness of 3/16". Drill 5/16" holes.



1700400 - Self-Tapping Screw - 3/8" x 1"



1702891 - Cap Screw - 3/8" x 1 1/4"



1704264 - Cap Screw - 3/8" x 2" - Grade 8



1700408 - Hex Nut - 1/4"



1701543 - Nylon Lock Nut - 1/4"



1700419 - Nylon Lock Nut - 5/16"



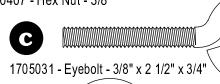
1704297 - Nylon Lock Nut - 5/16"



1704946 - Flanged Top Lock Nut - 5/16"



1700407 - Hex Nut - 3/8"



d

1705033 - Eyebolt - 3/8" x 5" x 3/4"





1701580 - Nylon Lock Nut - 3/8"





1700436 - Lock Washer - 1/4"





1700427 - Flat Washer - 1/4"





1700428 - Flat Washer - 5/16"





1700434 - Lock Washer - 3/8"



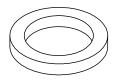


1700429 - Flat Washer - 3/8"

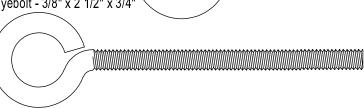


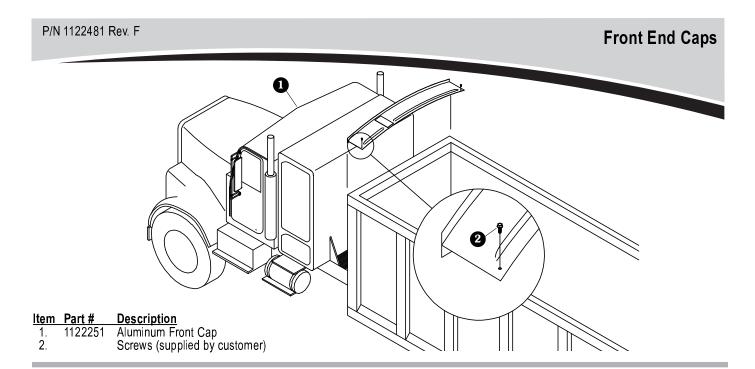
1702890 - Flat Washer - 1 1/4"



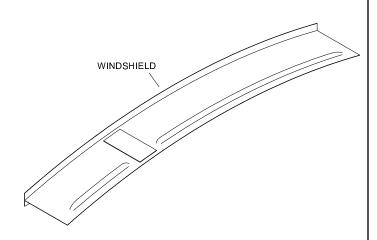


1118318 - Spacer Washer - 1/4" x 1.81"



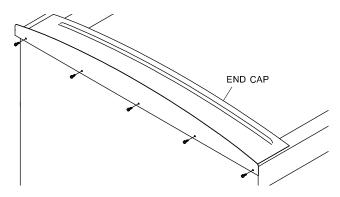


STEP 1: Place cap on box, aligning windshield at front of box.

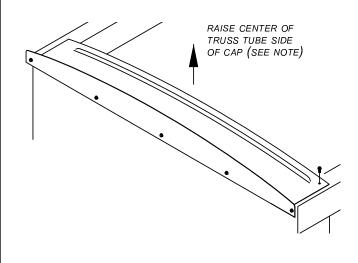


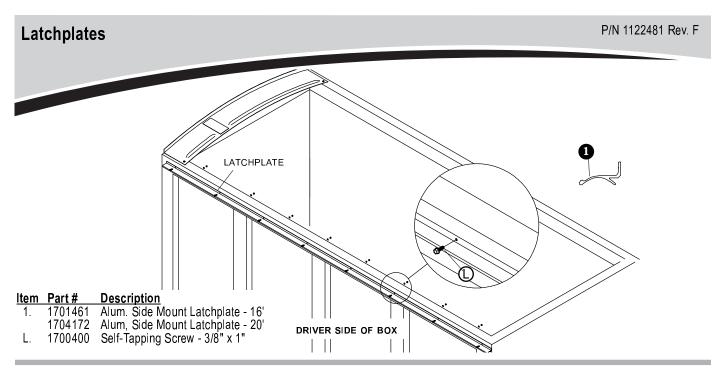
NOTE: For optimal water run-off and tarp support, make sure end cap is level before fastening sides of cap to box. While fastening sides of caps to box, raise center of truss tube side of cap to be level with or slightly higher than outside edge.

STEP 2: Drill holes and fasten screws across face of cap.

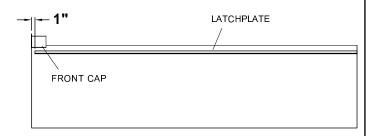


STEP 3: Drill hole as shown and fasten with screw.

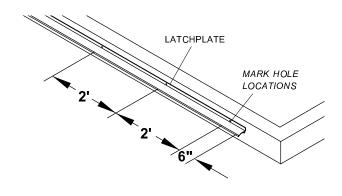




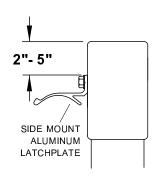
STEP 1: Adapt latchplate pieces to extend 2" past tarp at front and even with rear of trailer.



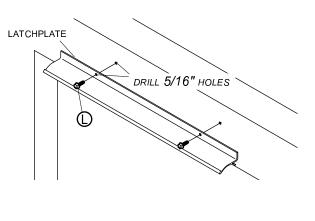
STEP 3: Mark hole locations on latchplate about every 2' apart, with holes no more than 6" from edges.



STEP 2: Starting at rear of box, position latchplate sections 2" to 5" down from top edge of rail on driver side of box, in an area free of obstructions. Clamp into place.

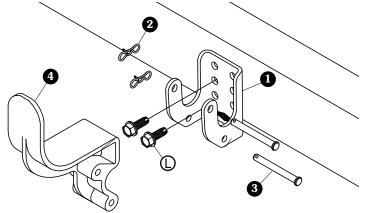


STEP 4: Drill 5/16" pilot holes through latchplate and box. Fasten with screws **①**.



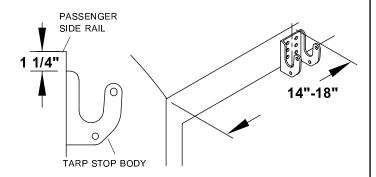
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Tarp Stops



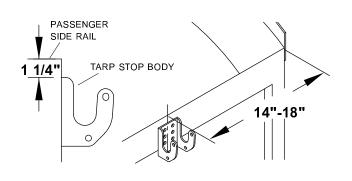
Item	Part #	Description
1.	1100833	Easy-Off Tarp Stop Body
2.	1704380	Bowtie Cotter Pin
3.	1703604	Clevis Pin - 5/16" x 2 7/8"
4.	1705454	Easy-Off Aluminum Tarp Stop Upright - 6" Offset
L.	1700400	Self-Tapping Screw - 3/8" x 1"

STEP 1: Locate first tarp stop body 14" to 18" from rear edge of trailer and 1 1/4" from top edge of rail on passenger side of box.

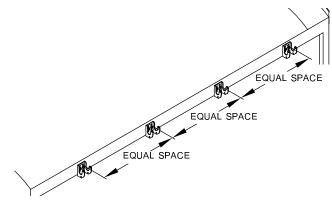


NOTE: Install tarp stop body on vertical surface. Fasten through holes that best fit top rail configuration.

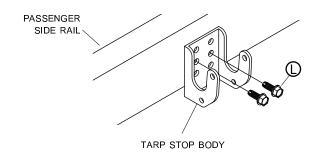
STEP 2: Locate second tarp stop body 14" to 18" from front of trailer and 1 1/4" from top edge of rail.

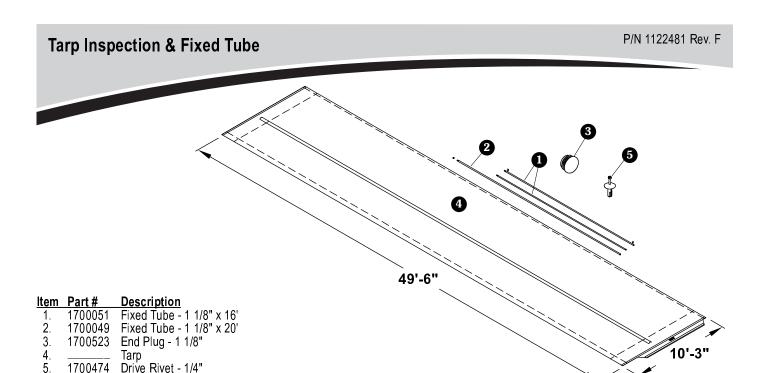


STEP 3: Equally space and vertically align remaining tarp stop bodies between front and rear tarp stop bodies.



STEP 4: Use tarp stop bodies as guides to mark hole locations. Drill 5/16" holes and fasten to box with screws **①**.

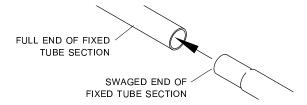




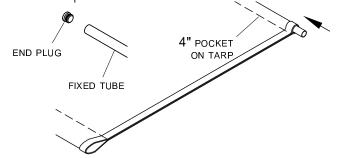
STEP 1: Open tarp and stretch tight. Measure and compare tarp measurements with those on sheet attached to tarp. Do not proceed with installation if tarp measurements do not match measurements specified on sheet. Call Shur-Co® or your local dealer for alterations or a replacement tarp.

NOTE: Tarps cannot be returned for free replacement beyond this point. Tarps damaged beyond this point may be returned for repair or replacement at owner's expense.

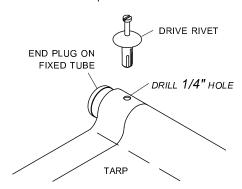
STEP 2: For boxes over 24', insert swaged end of fixed tube section into full end of second tube section. Align tubes, weld and grind smooth.



STEP 3: Install end plug into full end of tube weldment. Insert tube, end plug first, into 4" pocket on tarp at rear of tarp.

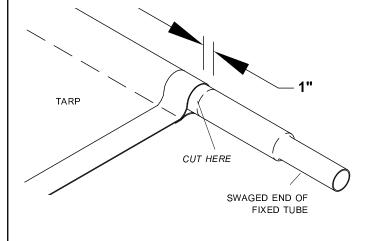


STEP 4: Extend fixed tube 1" past front edge of tarp. Drill 1/4" hole and fasten tarp to fixed tube with drive rivet.

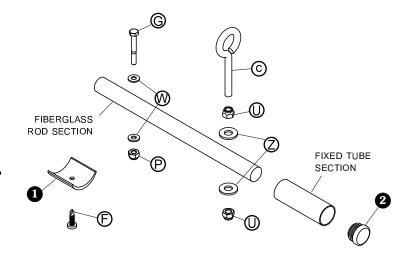


STEP 5: Stretch tarp along fixed tube toward rear of tarp.

Measure 1" past edge of tarp and remove remaining swaged end of fixed tube. Grind edges smooth.

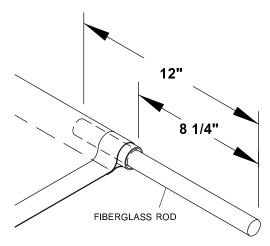


P/N 1122481 Rev. F Stretch Cord Return

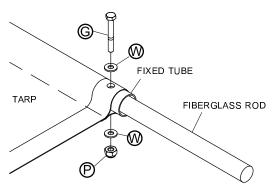


Item Part# **Description** 1701354 Plastic U-Clamp 1700523 End Plug - 1 1/8" 1704353 Self-Drilling Screw - 1/4" x 1" 1704260 Cap Screw - 1/4" x 2" G. 1701543 Nylon Lock Nut - 1/4" Nýlon Lock Nut - 3/8" 1701580 1700427 Flat Washer - 1/4" W. Flat Washer - 3/8" 1700429 1705031 Eyebolt - 3/8" x 2 1/2" x 3/4"

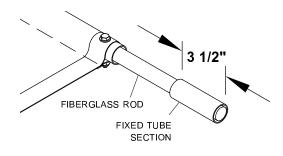
STEP 1: Cut scrap piece of fiberglass rod 12" long. Insert rod into fixed tube, leaving 8 1/4" extended past edge of fixed tube.



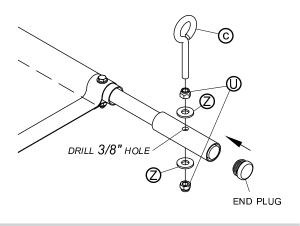
STEP 2: Stretch tarp tight and drill 1/4" hole through tarp, fixed tube and rod. Fasten with screw **③**, washers **①** and nut **③**.

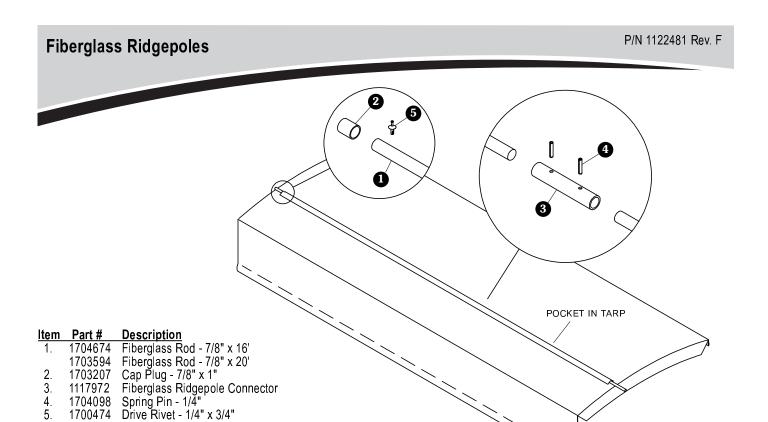


STEP 3: Cut scrap section of fixed tube to 3 1/2", removing swaged end. Grind edges smooth. Slide section over fiberglass rod and align ends flush.

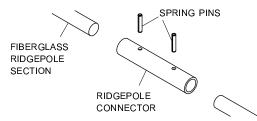


STEP 4: Drill 3/8" hole through fixed tube section and rod. Install eyebolt **⑤**, washers **⑥** and nuts **⑥**. Install end plug as shown.

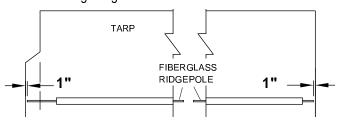




STEP 1: Insert first fiberglass ridgepole section halfway into ridgepole connector. Use hole in connector as guide to drill 1/4" hole through ridgepole section.

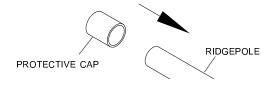


- **STEP 2:** Install spring pin through hole to secure ridgepole section to connector.
- STEP 3: Insert second fiberglass ridgepole section into opposite end of connector, butting end of second ridgepole against first ridgepole. Use hole in connector as guide to drill 1/4" hole through ridgepole section.
- STEP 4: Install spring pin through second hole to secure ridgepole section to connector.
- STEP 5: Cut assembled fiberglass ridgepole 2" shorter than length of entire tarp while tarp is laying flat. Grind rough edges smooth.

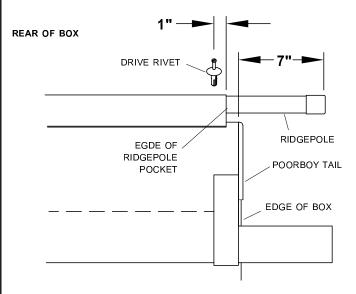


TIP: Wrap ridgepole with tape for smoother cut.

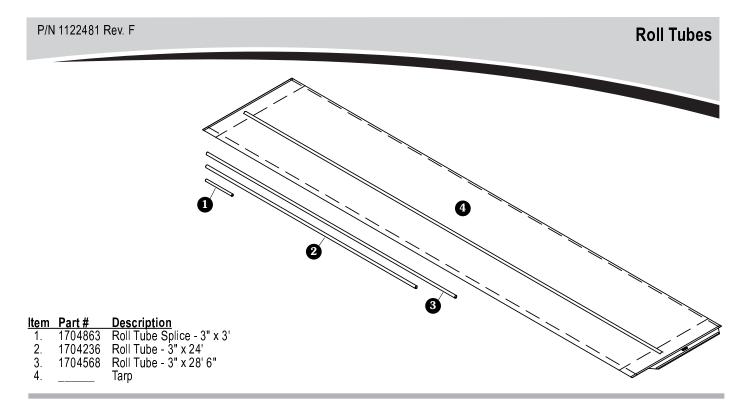
STEP 6: Install protective caps on both ends of ridgepole.



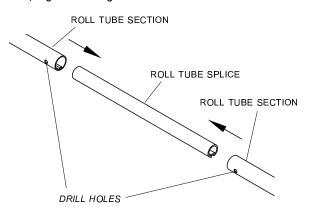
STEP 7: Insert ridgepole into ridgepole pocket on tarp. Align ridgepole 1" shorter than tarp at front of tarp and 7" past edge of box at rear.



STEP 8: Install drive rivet 1" from edge of pocket. Pull tarp to full length and install second drive rivet 1" from opposite end of pole.



STEP 1: Drill holes in ends of roll tube sections. Insert roll tube splice into roll tube sections as shown. Align tubes, plug weld and grind smooth.

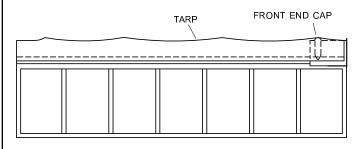


STEP 2: Cut roll tube assembly 8" longer than tarp. Grind edges smooth, then insert roll tube into 7" tarp pocket.



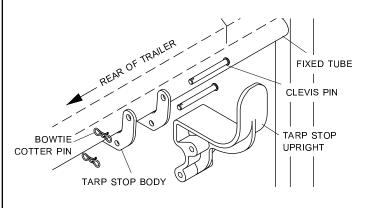
TIPS: Inflate 7" tarp pocket with air chuck while inserting roll tube. For ease of handling, wind tarp on roll tube completely before lifting tarp onto box.

STEP 3: Lift tarp onto trailer. Align tarp as shown on front end cap, with fixed tube on passenger side of box.



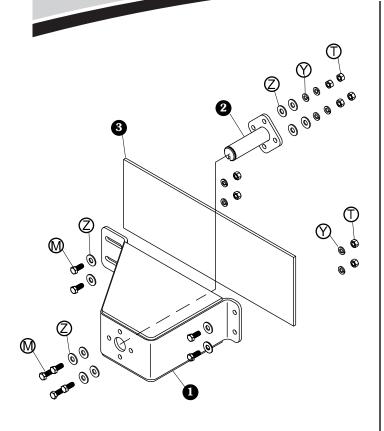
STEP 4: Adjust tarp so fixed tube rests squarely in tarp stop bodies. Fasten tarp stop uprights to tarp stop bodies with clevis pins. Secure with bowtie cotter pins.

NOTE: Align bowtie cotter pins toward rear of trailer as shown.



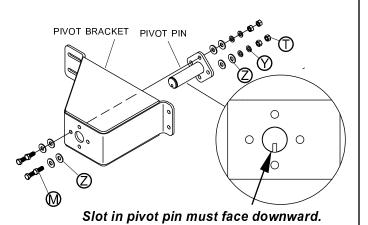
Front Pivot Bracket

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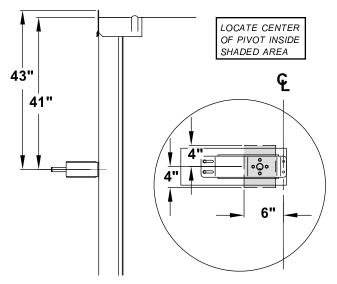
ltem	Part #	Description
1.	1122248	Pivot Mount Bracket
2.	1116920	Pivot Pin - 4 Spring
3.	1121584	Pivot Backer Plate - 7" x 20"
M.	1702891	Cap Screw - 3/8" x 1 1/4"
T.	1700407	Hex Nut - 3/8"
Y.	1700434	Lock Washer - 3/8"
Z.	1700429	Flat Washer - 3/8"

STEP 1: Fasten pivot pin to pivot bracket with screws ♠, flat washers ♠, lock washers ❖ and nuts ◐.

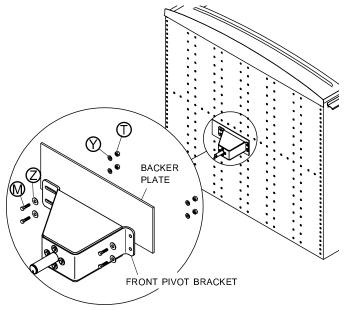


NOTE: Before drilling holes, make sure flex arm has clear path to operate. Read this page in its entirety before proceeding.

STEP 2: Locate front pivot mount bracket on passenger side of trailer so center of pivot lies within shaded area shown below. Measure 41" down from top of cap or 43" from top of windshield.

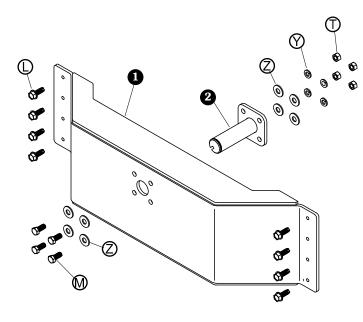


STEP 3: Place front pivot bracket and backer plate on front of trailer in orientation shown. Using bracket as guide, mark hole locations in backer plate and trailer.



STEP 4: Remove rivets and mount bracket and backer plate into rivet holes. If not possible, drill 13/32" holes in trailer. Fasten with screws ♥, flat washers ♥ and nuts ♥.

P/N 1122481 Rev. F **Rear Pivot Bracket**



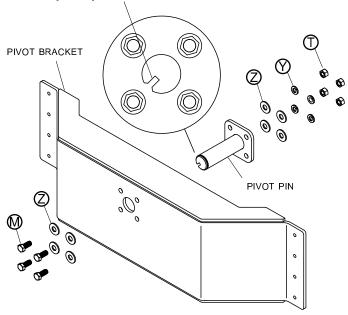
ltem	Part #	Description
1.	1122245	Pivot Mount I

Bracket - 5" Standoff Pivot Pin - 4 Spring 2. 1116920 1700400 Self-Tapping Screw - 3/8" x 1" Cap Screw - 3/8" x 1 1/4"

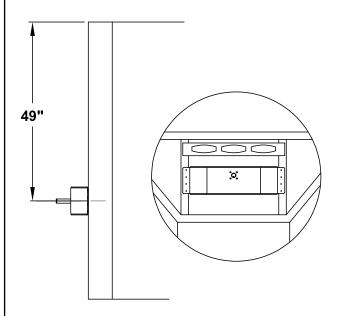
Μ. 1702891 Hex Nut - 3/8" 1700407 Lock Washer - 3/8" 1700434 1700429 Flat Washer - 3/8"

STEP 1: Fasten pivot pin to pivot bracket with screws ②, flat washers ② lock washers ③ and nuts ①.

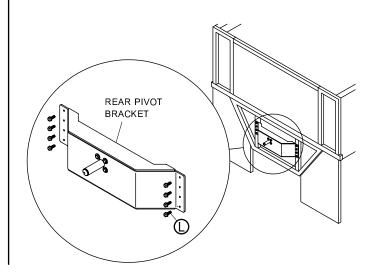


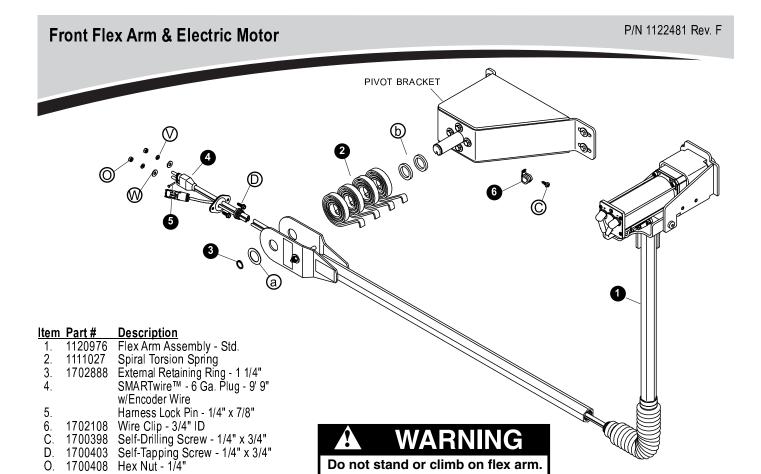


Center rear pivot bracket on rear of trailer, 49" below top of trailer as shown.



STEP 3: Place rear pivot bracket on rear of trailer in orientation shown. Using rear pivot bracket as guide, mark and drill 5/16" holes in trailer. Fasten with screws 1.





Do not stand or climb on flex arm.

Standing or climbing on flex arm

could result in fall/impact causing

serious injury or death.

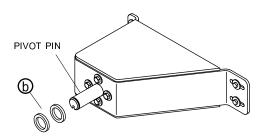
STEP 1: Assemble spacer washers **6** onto pivot pin.

Lock Washer - 1/4"

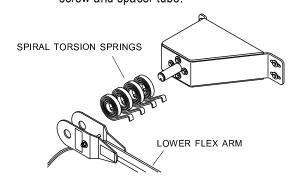
1118318 Spacer Washer - 1/4" x 1.28"

1700427 Flat Washer - 1/4"

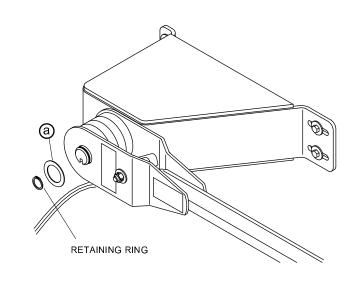
1702890 Flat Washer - 1 1/4"



STEP 2: Assemble spiral torsion springs and lower flex arm onto pivot pin. Hook springs over 5/16" x 3 1/2" cap screw and spacer tube.



STEP 3: Secure with washer **②** and retaining ring.



0.

V.

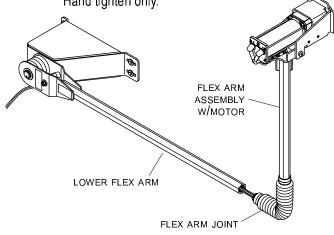
W.

1700408

1700436

Flex arms are under tension while torsion springs are engaged. Use caution while assembling and disassembling arms. Failure to read and follow instructions could result in serious injury or death.

STEP 4: Thread flex arm joint into lower flex arm. Hand tighten only.

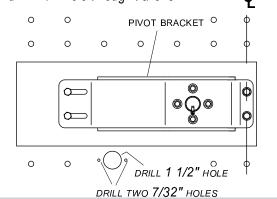


NOTE: Motor assembly on upper flex arm must face toward trailer as shown.

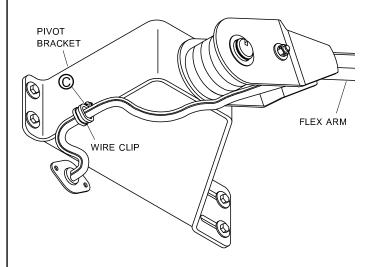
Do not twist wire when threading flex arm joint into lower flex arm.

NOTE: Wire lengths are predetermined. Before installing SMARTwire™ components, review and confirm wire routing so wires reach components with ample room for connection.

STEP 5: Measure 11" horizontally from center line of trailer and 1" down from lower edge of pivot bracket. Mark and drill 1 1/2" hole through trailer skin.



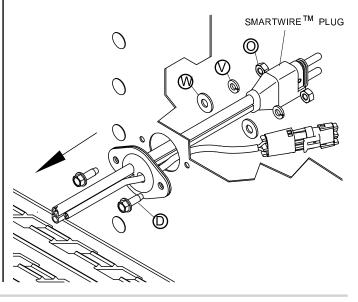
STEP 6: Route 6-ga. wire from flex arm through trailer skin. Fasten wire clip to hole with screw .

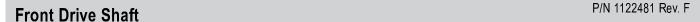


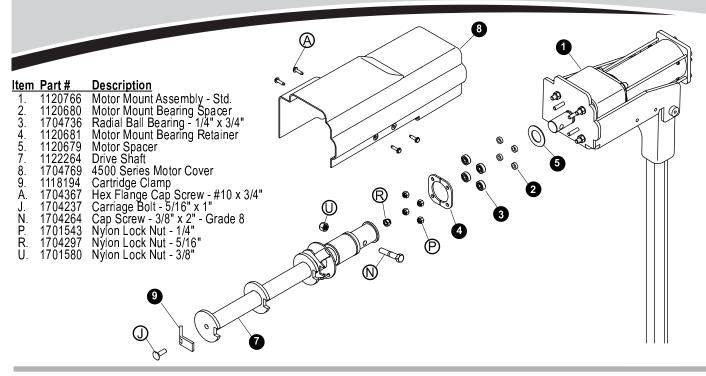
NOTE: Drill hole on opposite side of pivot bracket from flex arm to prevent wire from being pinched during operation.

Align adapter plug with 1 1/2" hole. Using plug as STEP 7: guide, mark and drill two 7/32" holes as shown.

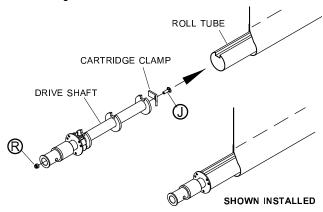
STEP 8: Fasten adapter plug to front of trailer with screws ●, flat washers ●, lock washers ● and nuts ●.



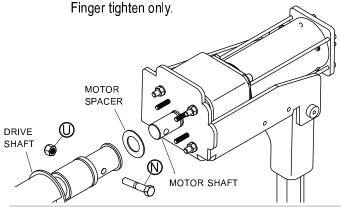




STEP 1: Loosely fasten cartridge clamp to drive shaft with screw ● and lock nut ⊕. Insert drive shaft into roll tube as shown. To secure drive shaft to roll tube, tighten nut ⊕ to 20 ft*lbs.



STEP 2: Slide motor spacer over motor shaft. Slide drive shaft over motor shaft. Fasten with screws **3** and nuts **1**.



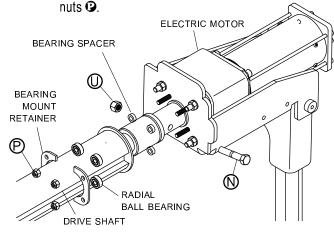
A CAUTION

If clearance lights are in path of roll tube, install deflector to prevent roll tube from damaging lights.

WARNING

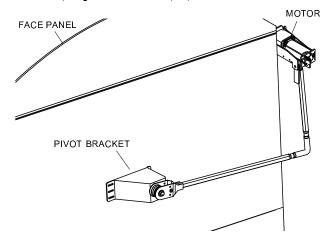
Flex arms are under tension while torsion springs are engaged. Use caution while assembling and disassembling arms. Failure to read and follow instructions could result in serious injury or death.

Fasten drive shaft to electric motor shaft with screw and lock nut ①. Install bearing spacers, radial ball bearings and bearing mount retainer and secure with

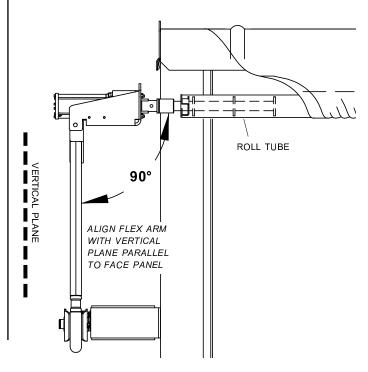


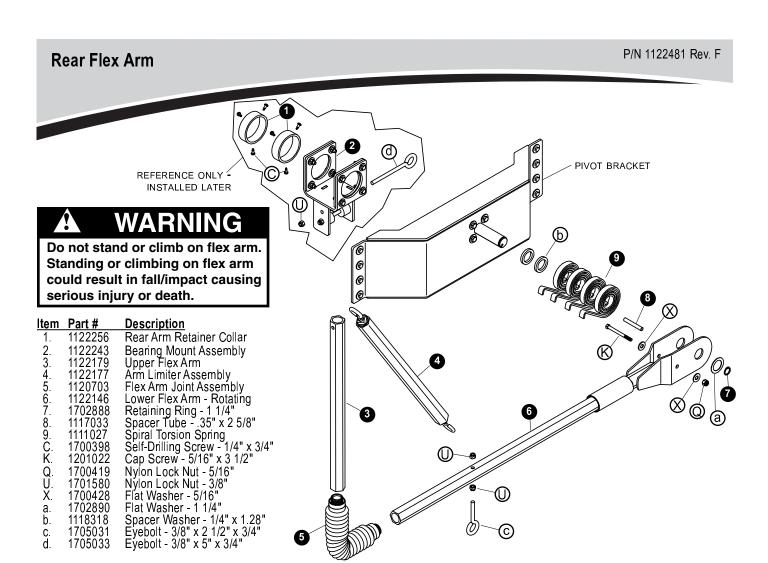
NOTE: Make sure all fasteners holding motor to upper flex arm bracket are tightened securely.

STEP 4: Position motor as shown below. Make sure torsion springs load when tarp opens.

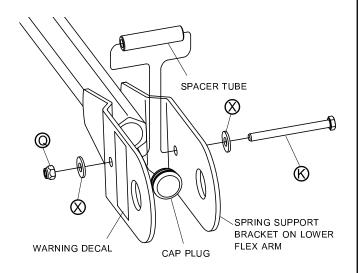


STEP 5: Align flex arm vertically with front of trailer and 90° to roll tube.

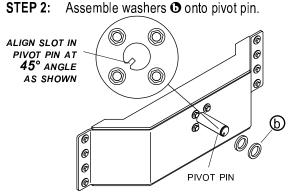




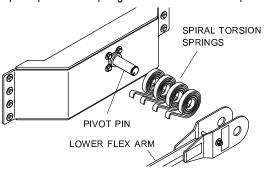
STEP 1: Install cap plug on lower flex arm. Fasten spacer tube into spring support bracket on lower flex arm with screw ③, washers ③ and nut ④.



NOTE: Insert cap screw through flex arm so head of screw will be on inside of assembly (toward trailer). Warning label must be in plain view on outside of assembly.



STEP 3: Assemble spiral torsion springs and lower flex arm onto pivot pin. Hook springs over 3/8" x 3 1/2" cap screw.

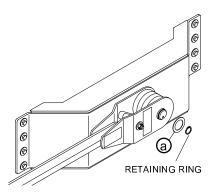


A

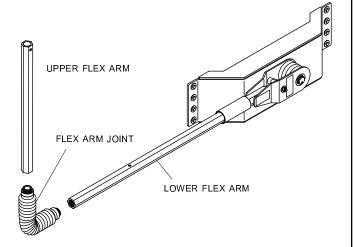
WARNING

Flex arms are under tension while torsion springs are engaged. Use caution while assembling and disassembling arms. Failure to read and follow instructions could result in serious injury or death.

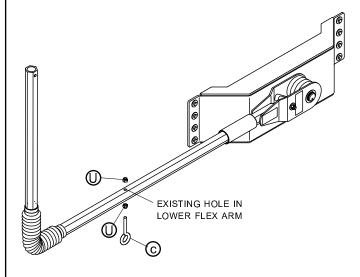
STEP 4: Secure with washer 1 and retaining ring.

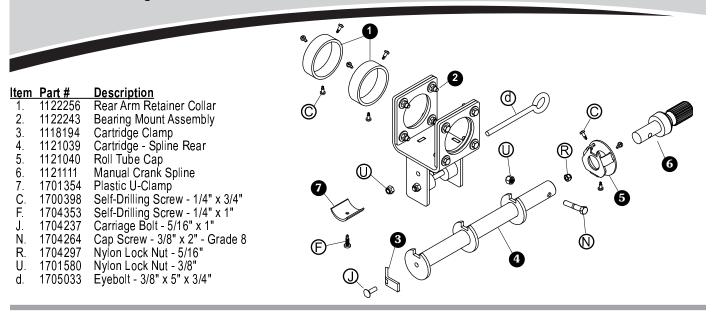


STEP 5: Thread flex arm joint into lower flex arm, then into upper flex arm. Hand tighten only.

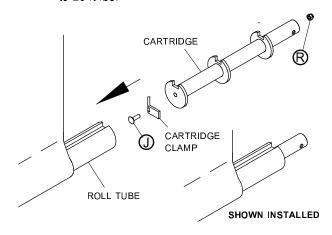


STEP 6: Secure eyebolt **©** to lower flex arm with nuts **①** through existing hole as shown.

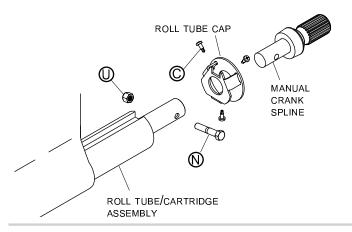




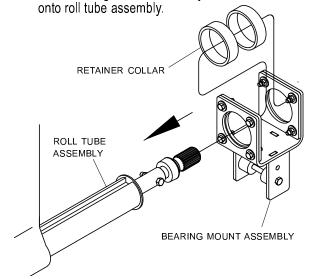
STEP 1: Loosely fasten cartridge clamp to cartridge with screw
● and lock nut ⊕. Insert cartridge into roll tube as shown. To secure cartridge to roll tube, tighten nut ⊕ to 20 ft-lbs.



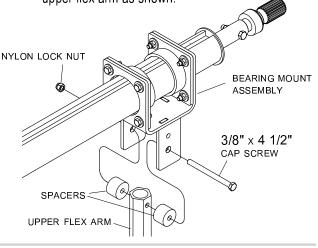
step 2: Install roll tube cap onto roll tube/cartridge assembly and fasten with screws ⊕. Install manual crank spline onto roll tube/cartridge assembly and fasten with screw Φ and lock nut ❶.



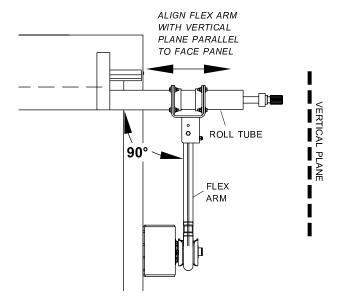
STEP 3: Slide bearing mount assembly and retainer collars



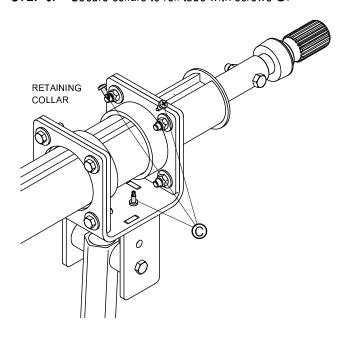
STEP 4: Disassemble 3/8" x 4 1/2" cap screw and lock nut from bearing mount assembly. Reassemble, connecting upper flex arm as shown.



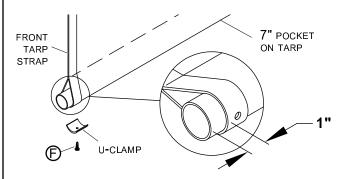
STEP 5: Move bearing mount assembly on rear flex arm forward or backward to align rear flex arm parallel with rear face of trailer and 90° to roll tube.



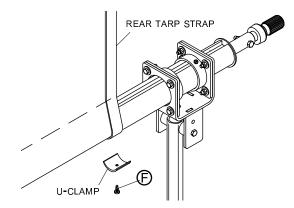
STEP 6: Secure collars to roll tube with screws **©**.



STEP 7: Fasten tarp to roll tube with existing U-clamps and screws. Center first U-clamp on front tarp strap, positioning screw **9** on crease at bottom of tarp pocket. Fasten U-clamp with screw **9**.

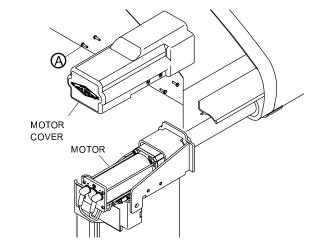


STEP 8: Stretch tarp along roll tube so both sides of tarp are equal. Install U-clamp on rear tarp strap.



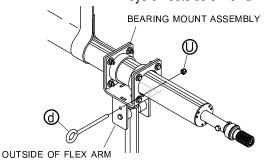
STEP 9: Install remaining U-clamps on remaining tarp straps.

STEP 10: Fasten motor cover onto motor with screws **②**.



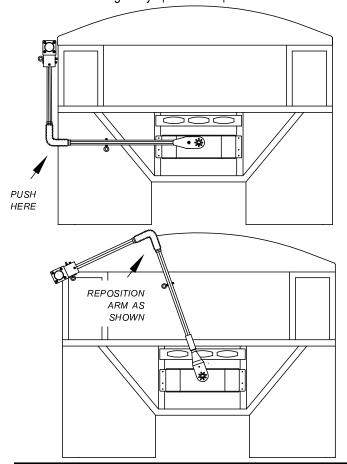
STEP 11: Tighten all fasteners securely. Tighten front and rear flex arm connections.

STEP 1: Fasten eyebolt ① to bearing mount assembly with nut ①, positioning eye on outside of flex arm.



NOTE: Eye on eyebolt will be on outside of upper flex arm while arm is in original position and on lower side of upper of flex arm after arm is repositioned.

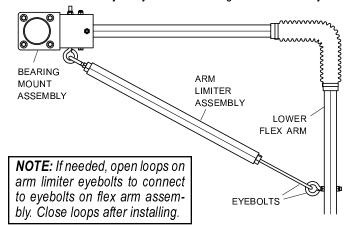
STEP 2: Holding rear flex arm joint, pull outward while pushing arm diagonally upward to reposition arm as shown.



A WARNING

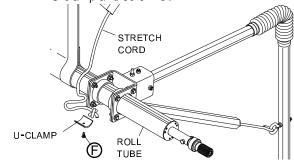
Arm limiter assembly is under tension while spring is engaged. Use caution while installing arm limiter assembly to prevent injury.

STEP 3: Connect first eyebolt on arm limiter assembly to eyebolt on lower flex arm. Connect second eyebolt on limiter assembly to eyebolt on bearing mount assembly.



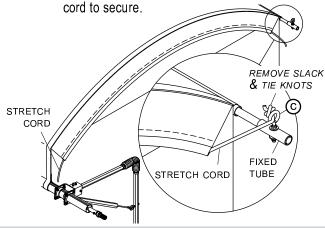
NOTE: During operation, arm limiter assembly will extend and compress as needed while holding upper and lower flex arms together.

STEP 4: On driver side of trailer, tie knots in end of stretch cord, fold end of cord back and fasten cord to roll tube with U-clamp and screw **3**.

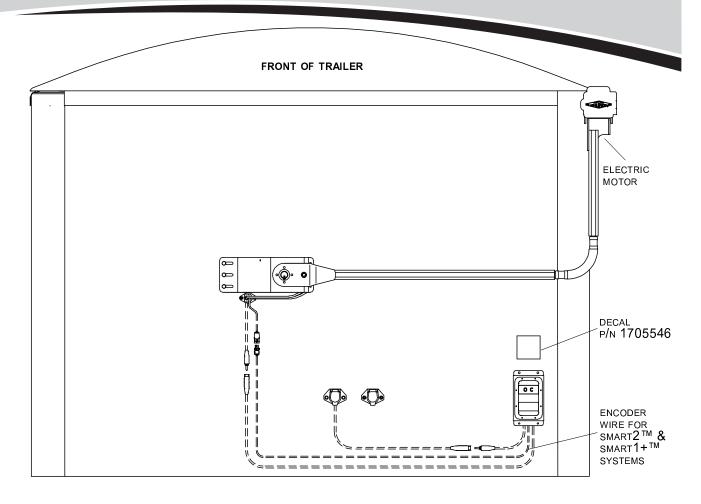


NOTE: As tarp rolls open, stretch cord should wrap around roll tube, behind bearing mount assembly on rear flex arm.

STEP 5: With tarp closed, identify stretch cord in rear flap pocket on tarp. On passenger side of trailer, slide end of stretch cord through eyebolt **©** on fixed tube. Pull stretch cord to remove slack and tie knots in end of



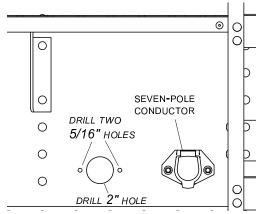
Wireless Receiver - Trailer Mounting & Wiring



NOTE: Wire lengths are predetermined. Before installing SMARTwire™ components, review and confirm wire routing so wires reach components with ample room for connection.

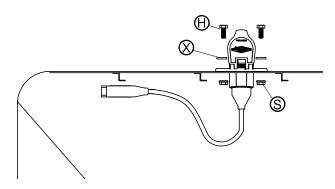
DUAL-CONDUCTOR SOCKET

STEP 1: Locate dual-pole conductor socket near seven-pole conductor socket as shown. Determine location and drill 2" hole through trailer skin.



STEP 2: Align socket over 2" hole. Using holes in flanges on socket as guide, mark and drill two 5/16" holes.

STEP 3: Fasten conductor socket to trailer with screws ①, washers ③ and nuts ⑤.

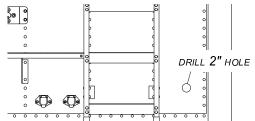


A CAUTION

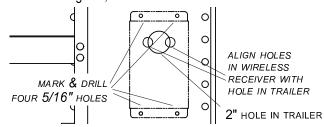
Do not fasten SMARTwire $^{\text{TM}}$ components to trailer through hopper walls.

SHUR-CO® WIRELESS RECEIVER

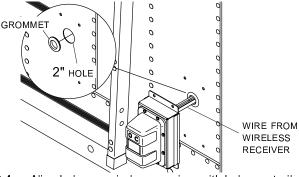
STEP 1: In order to clear travel area of front arm, locate Shur-Co® wireless receiver as low as possible on front of trailer. Determine location and drill 2" hole through trailer skin.



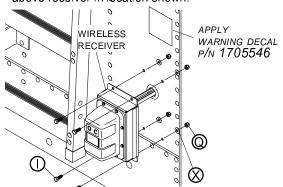
STEP 2: Align holes in wireless receiver over 2" hole in trailer as shown below. Using holes on flanges on receiver as a guide, mark and drill four 5/16" holes as shown.



STEP 3: Install grommet into 2" hole. Insert wire from wireless receiver through grommet.

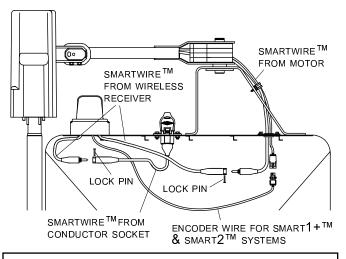


STEP 4: Align holes on wireless receiver with holes on trailer. Fasten receiver to trailer with screws ❶, washers ❷ and nuts ④. Adhere warning decal P/N 1705546 above receiver in location shown.



WIRING SCHEMATIC

STEP 1: Connect SMARTwire ™ from wireless receiver to SMARTwire ™ from electric motor. Connect SMARTwire ™ from wireless receiver to SMARTwire ™ from conductor socket. Secure connections with lock pins. Secure wires to trailer with cable clips and screws. If needed, use cable ties.

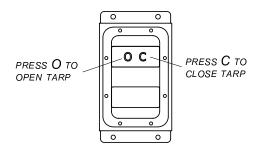


NOTE: Coat each connection with dielectric grease (P/N 1704378) to prevent corrosion.

A CAUTION

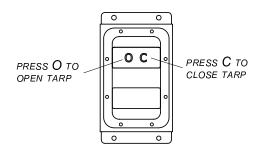
Check all hardware for complete assembly before operating. Inspect system at this time and adjust as required.

STEP 2: Check motor direction by pressing either button. If button is released and operation continues, system is in *Express Mode*. To stop operation, press button again. If switch is running system backwards, program remote to wireless receiver and rewire as directed in troubleshooting guide in remote instructions.



NOTE: Receiver may be pressure washed, but keep nozzle at least 3' from system while spraying.

P/N 1122481 Rev. F **Operation**



NOTE: 4500 Series HD trailer-mounted control boxes now operate in **EXPRESS MODE**, for both SMART1+™ and SMART2™ remote systems. Pressing O or C button on control box initiates express open or close operation. After that, pressing either button will stop tarp operation. If neither button is pressed, operation will automatically stop at end of travel. On SMART2™ systems, if travel stops are not set, trailer-mounted control box operates in MANUAL (momentary) MODE. Remotes for both systems are shipped with tarp channel set to **EXPRESS MODE** and can be configured as desired.

WARNING DO NOT OPERATE **MOTORIZED SYSTEMS** WHILE INDIVIDUALS

ARE ON OR OCCUPYING &
BOX/TRAILER

BOX/TRAILER/HOPPER.

THIS TARP SYSTEM OPERATES IN EXPRESS MODE. UPON PRESSING THE OPEN/CLOSE BUTTON THE TARP SYSTEM WILL CONTINUE TO TRAVEL TO THE END STOPS. TO STOP THE MOTOR, PRESS EITHER BUTTON. READ OWNERS MANUAL BEFORE OPERATING. CONTACT SHUR-CO® FOR ALL TARP **SYSTEM QUESTIONS AT 1-866-748-7435.**

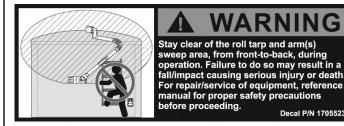
Decal shown above must be placed above wireless receiver on front of box.

NOTE: Tarp systems will operate in **EXPRESS MODE** when using buttons on trailer-mounted control box, if encoder wires are connected. For SMART2™ systems, travel stops must also be set, otherwise you must press and hold buttons. When in EXPRESS MODE, press and release buttons to open and close tarp (operation will continue until complete after releasing button). When in MANUAL MODE, press and hold buttons (operation will stop if button is released). See remote instruction manual for detailed instructions on remote operation.

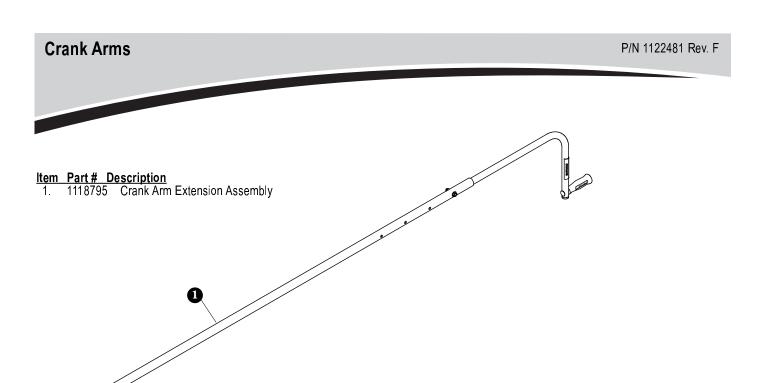
NOTE: Tarp systems operate in **EXPRESS MODE** when commanded to operate from buttons on trailer-mounted control box. Closing remote lid or pressing select button will not stop system in this case. Pressing open or close button on remote will stop system if in range.

NOTE: Tarp systems operate in EXPRESS MODE when using buttons on trailer-mounted control box, if encoder wires are connected. For SMART2™ systems, travel stops must also be set. Otherwise you must press and hold buttons (see remote instructions for SMART2™ systems).

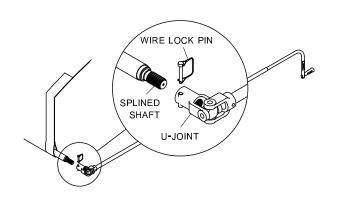
Stay clear of roll tarp and arm(s) area of travel during operation. Failure to do so could result in serious injury or death.

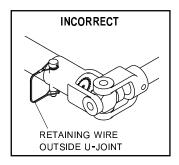


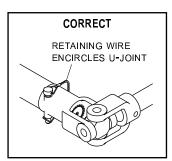
Decal P/N 1705523



STEP 1: Place splined U-joint on splined shaft. Secure with wire lock pin.





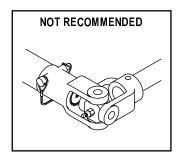


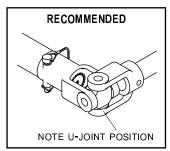
NOTE: U-joint is designed to operate as shown below at right and is able to withstand considerably more pressure in this position.

CAUTION

to do so could result in injury.

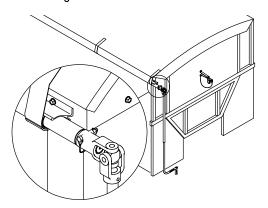
Do not open or close tarp without U-joint securely fastened to splined shaft with wire lock pin. Failure



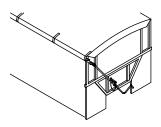


Tarp Tension Adjustment

STEP 1: Hold crank firmly with both hands and roll tarp closed under latchplate. Bring crank handle down perpendicular to ground.

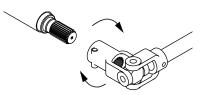


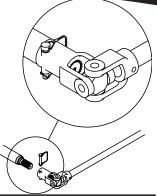
STEP 2: Tighten tarp by lifting crank handle up into crank retainer.



STEP 3: Check tarp tension. It should take 40 to 60 pounds of pressure to force crank handle into crank retainer. Crank extension will bend 1/8".

STEP 4: Adjust tension, if required, by removing U-joint from splined shaft, rotating U-joint one tooth and replacing onto splined shaft.



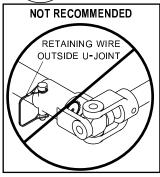


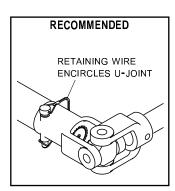
STEP 5: Repeat steps 3 and 4 until correct tension

is achieved.

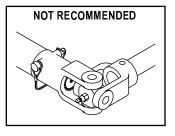
STEP 6: Secure U-joint to

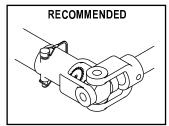
splined shaft with wire lock pin.





NOTE: U-joint is designed to operate as shown below at right and is able to withstand considerably more pressure in this position.





NOTE: Monitor tarp tension daily to prevent premature tarp wear.

CRANK SAFETY



A CAUTION

Do not open or close tarp without U-joint securely fastened to splined shaft with wire lock pin.



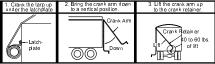
Uncontrolled crank spin. Hold crank firmly with both hands while operating. Failure to do so may result in minor or moderate injury.

PLACE ONLY THE LOWER PORTION OF THIS DECAL IN A LOCATION VISIBLE TO THE OPERATOR OR ALL WARRANTIES ARE VOID!!

ATTENTION!

THE TARP MUST BE KEPT TO A RECOMMENDED 40-60 LBS. OF TENSION OR EXCESSIVE TARP WEAR MAY OCCUR. DO NOT WALK OR STAND ON THE END CAPS.

DO NOT OPERATE THIS VEHICLE, AT HIGHWAY SPEEDS WHILE THE TARP SYSTEM IS IN THE "OPEN" POSITION!



away from the latchplate.

Remove the crank arm from the splined shaft.

Rotate the crank one or two teeth and reassemble.

To Adjust The Tarp Tension

Shur-Co., Yankton, SD 1-800-4 SHUR-LOK

NOTE:

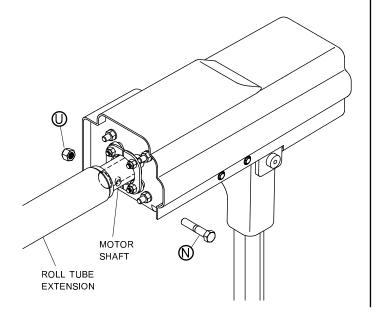
Install warning decal shown above near crank retainer on box or all warranty claims will be void.

Perform the following steps to change your 4500 Series Electric system to a manual crank operation:

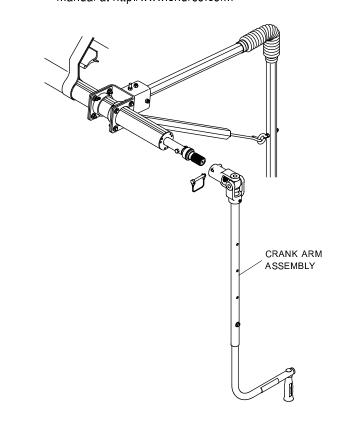
NOTE: Store manual crank arm in truck or mounted to trailer. (Example - above kingpin in the apex.)

STEP 1: Close tarp, letting roll tube hang loose under latchplate.

STEP 2: At front of trailer, remove screw **3** and nut **9** from motor shaft and roll tube extension connection.



STEP 3: Remove protective cap and install crank arm assembly as shown in Shur-Lok® owner's manual. View owner's manual at http://www.shurco.com.

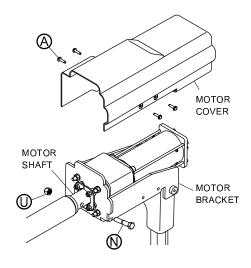


A CAUTION

Do not open or close tarp without U-joint securely fastened to splined shaft with wire lock pin. Failure to do so could result in injury.

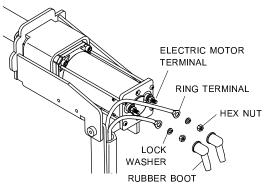
REMOVE EXISTING MOTOR

STEP 1: Disconnect electric power to trailer. Unfasten and remove motor cover. Unfasten screw **3** and nut **4** holding motor shaft to roll tube/front arm assembly.

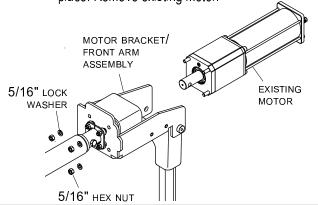


NOTE: Leave roll tube fastened to motor bracket.

STEP 2: Disconnect electric wires from motor terminals.

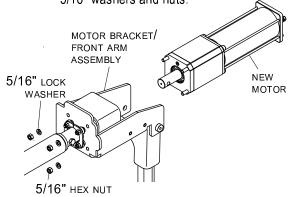


STEP 3: Unfasten and remove only 5/16" lock washers and hex nuts holding motor to motor bracket/front arm assembly, leaving motor mount bearing retainers in place. Remove existing motor.

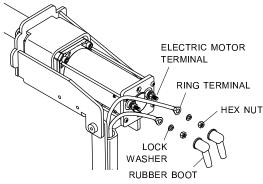


INSTALL NEW MOTOR

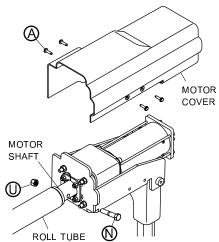
STEP 1: Install new motor. Fasten motor to motor bracket with 5/16" washers and nuts.



STEP 2: Connect electric wires to motor terminals.

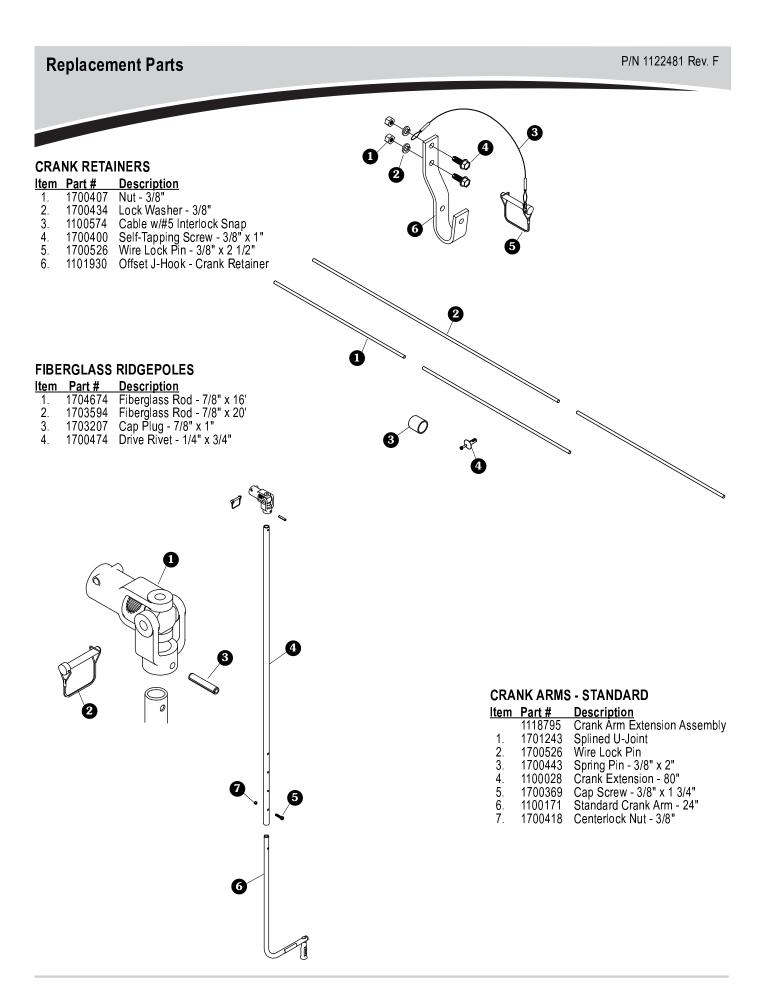


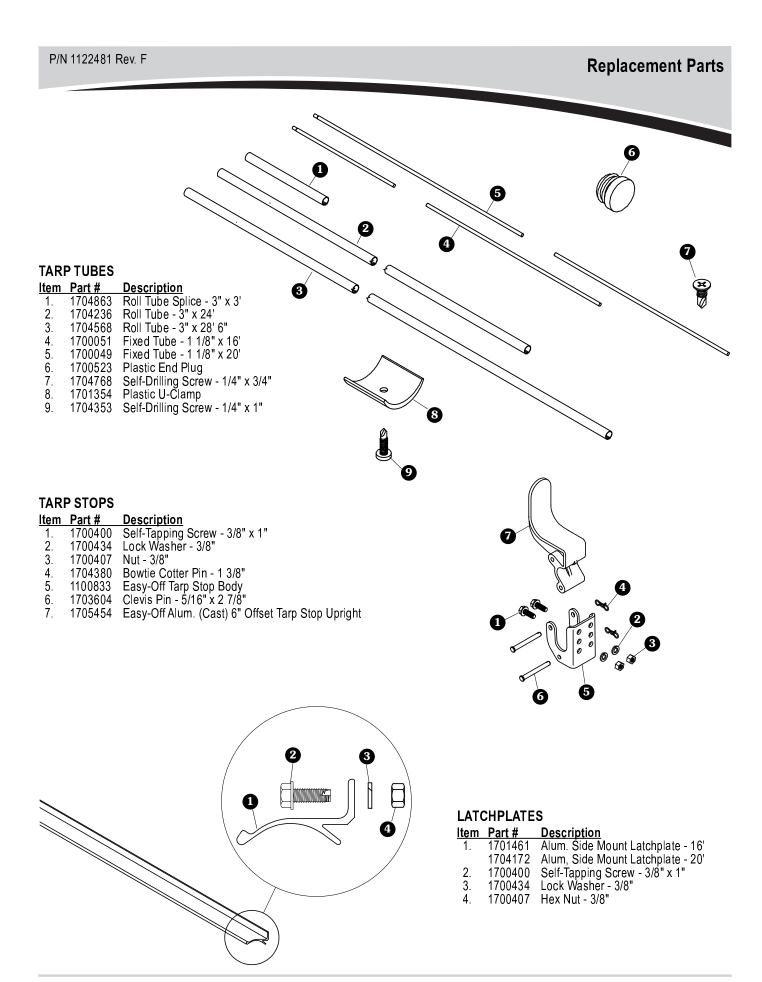
STEP 3: Fasten motor shaft to roll tube with screw ♠ and nut ♠. Replace motor cover and fasten to motor with screws ♠. Reconnect electric power.

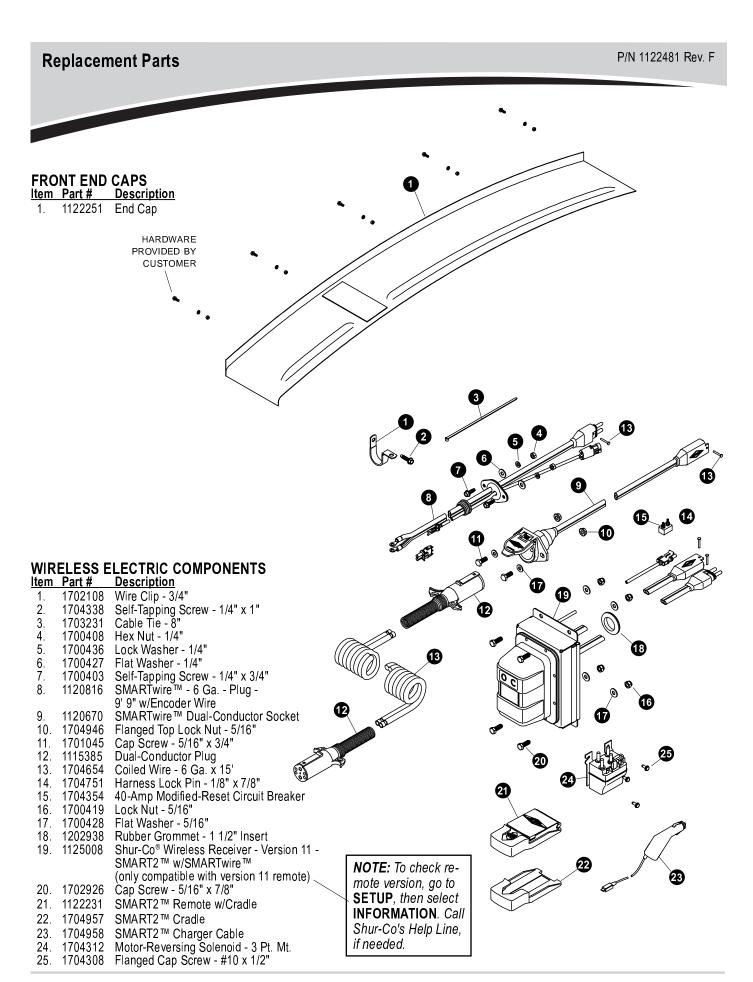


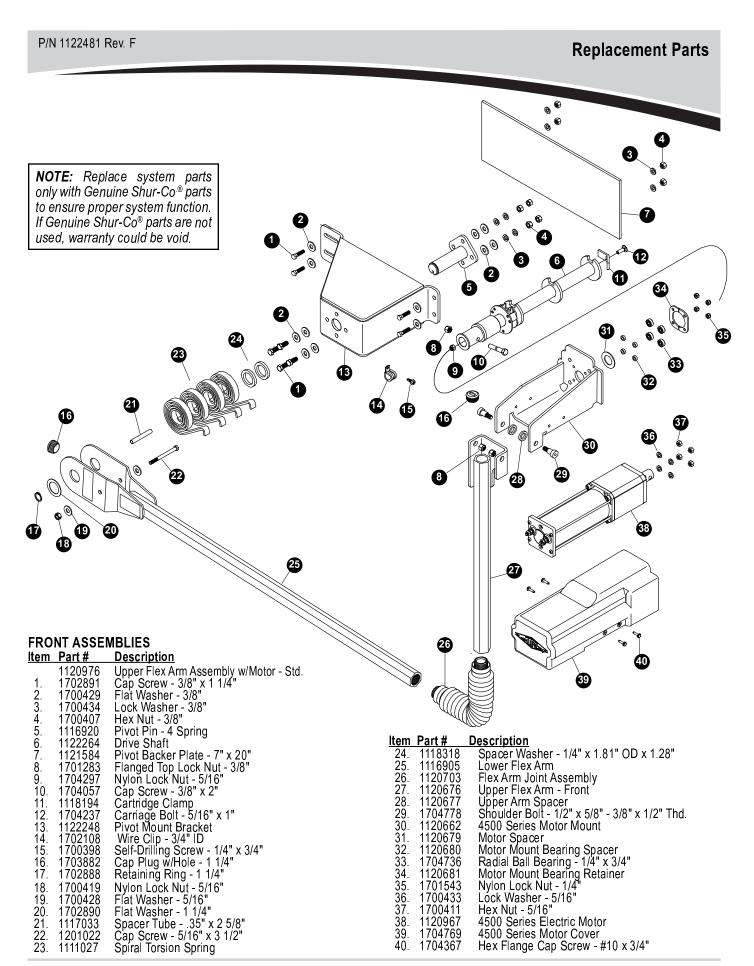
A CAUTION

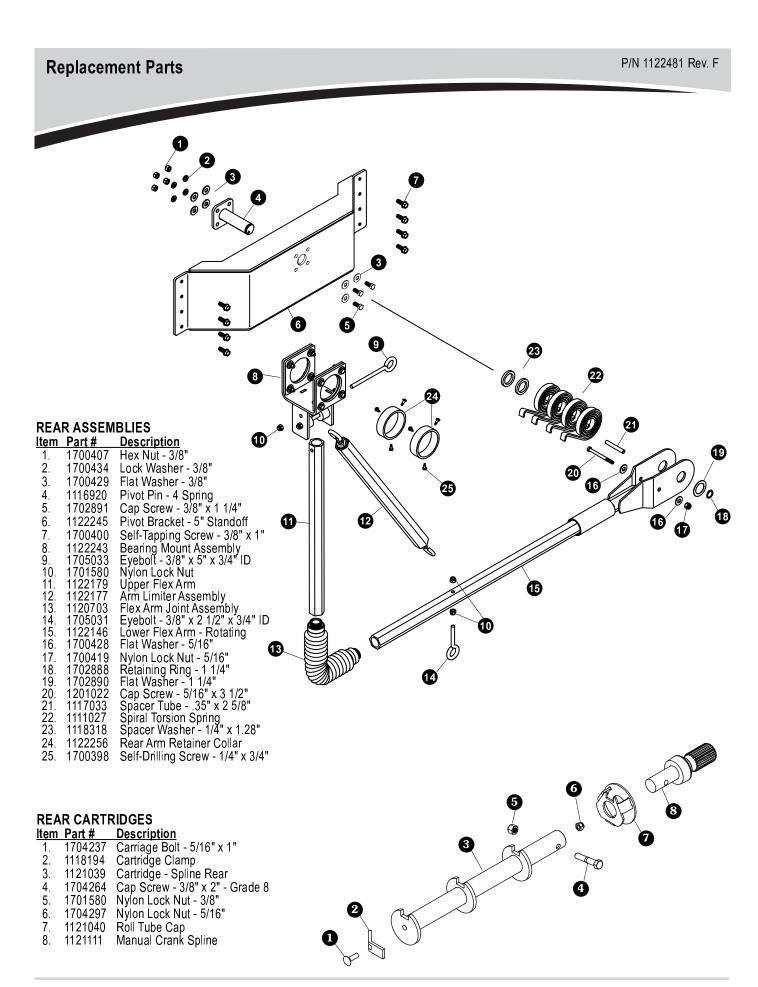
Check all hardware for complete assembly before operating. Inspect system at this time and adjust as required.

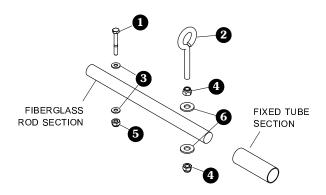












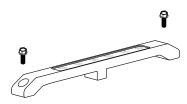
STRETCH CORD RETURNS

<u>ltem</u>	Part #	<u>Description</u>
1.	1704260	Cap Screw - 1/4" x 2"
	1705031	Eyebolt - 3/8" x 2 1/2" x 3/4" ID
3.	1700429	Flat Washer - 3/8"
4.	1701580	Nylon Lock Nut - 3/8"
5.	1701543	Nylon Lock Nut - 1/4"
6.	1700427	Flat Washer - 1/4"

OPTIONS & UPGRADES

ROLL TUBE DEFLECTOR

Fasten roll tube deflectors to side of box to keep roll tube from damaging paint on sides of trailer.



TARP OPTIONS

22-oz. heavy-duty fabric, multicolored tarps, personalized tarps, reinforcements, extra length or width, 13 vibrant colors available.

PROFESSIONAL TARP REPAIR KIT

Repair your tarp using the heat-seal method. No messy adhesives or solvents. Kit includes Wagner heat gun, scissors, roller, 12' of 18-oz. or 22-oz. tarp (specify color) and instructions.



OPERATION & MAINTENANCE

Maintenance Schedule Every 2-4 weeks:

- 1. Inspect tarp repair any tears, cuts or worn areas.
- 2. Inspect hardware securely tighten any loose fasteners.

Operating Instructions To uncover load:

- 1. Release crank from crank retainer.
- 2. Turn crank clockwise (counter-clockwise for reverse roll) until tarp has rolled up against tarp stops.
- 3. Place crank back into crank retainer.

To cover load:

- 1. Release crank from crank retainer.
- 2. Turn crank counter-clockwise (clockwise for reverse roll) until tarp is unrolled over edge of trailer.
- 3. Continue cranking to roll tarp up under latchplate.
- 4. Bring crank arm down to a vertical position.
- 5. Swing crank arm up and place into crank retainer.

Close cover at all times, except when loading or unloading, to extend the life of your Shur-Lok® system.

Open cover while unloading box. Unloading box with cover closed will create a vacuum which could cause system damage.

OPERATING SAFETY INSTRUCTIONS

- 1. Keep body and clothing clear of moving parts.
- 2. Hold crank firmly with both hands while opening and closing tarp.
- 3. Keep 40 to 60 lbs. of tension in crank retainer or excessive tarp wear may occur.
- Secure U-joint on crank arm to splined shaft on roll tube with wire lock pin before opening or closing tarp.
- 5. Do not drive vehicle at highway speeds with tarp open.

MORE QUALITY PRODUCTS FROM SHUR-CO®

- Genuine Replacement Tarps
- **■** Genuine Replacement Parts
- Agriculture Products
 - Value Series Shur-Lok®
 - Super Duty Shur-Lok®
 - Shur-Lok® Junior
 - Premium Belt 'n Ratchet
 - Cable-Lok™
 - Turning Point™ Bow
 - Tater-Top $^{\text{\tiny TM}}$
- SMARTrailer[™] Accessories for Agriculture Products
 - SMART2TM Remote
 - SMART1 + TM Remote
 - 4500 Series HD Electric
 - Electric Shur-Lok®
 - AutoTrap™ Hopper Opener
 - ProTrap® Hopper Opener
 - Electric Gate & Hoist
 - LiteALLTM Work Lights
 - Cable-LokTM Electric Upgrade
 - Electric Turning Point™ Bow
 - Solar Power Pack
- Flatbed Products
 - ShurTite[™] Retractable Tarps
 - Stock Lumber & Steel Tarps
- Custom Products
 - Fitted Truck Covers
 - Flat Utility Tarps
 - Bean Drill Covers
 - Shur-Lok® Tarp Cords
 - Gustbuster™ Tarp Cords

- Construction Products
 - Super Duty Shur-Lok®
 - Shur-Trak II™
 - Cover-Pro II®
 - Turning Point™ Bow
 - IronSide $^{\text{\tiny TM}}$ Side-Dump System
 - Arm-Matic™
 - DuraPull™
 - Econo-Pull™
 - Turbo Tarp2™
 - 2000 Series
 - 5000 Series
 - HammerTM
 - Bullet™
 - Flash™
 - Long ArmTM
- SMARTrailer[™] Accessories

for Construction Products

- 4500 Series HD Electric w/Gate FlexTM
- Shur-Trak II™ Electric Upgrade
- Cover-Pro II® Electric Upgrade
- Electric Turning Point™ Bow
- Solar Power Pack
- **■** Waste Products
 - SWAT TM
 - The OxTM
 - Quick-Flip III™
 - SidewinderTM
 - Sidewinder[™] 350
 - HyTower™ SL
 - HyTowerTM DL
 - Double-Flip™

