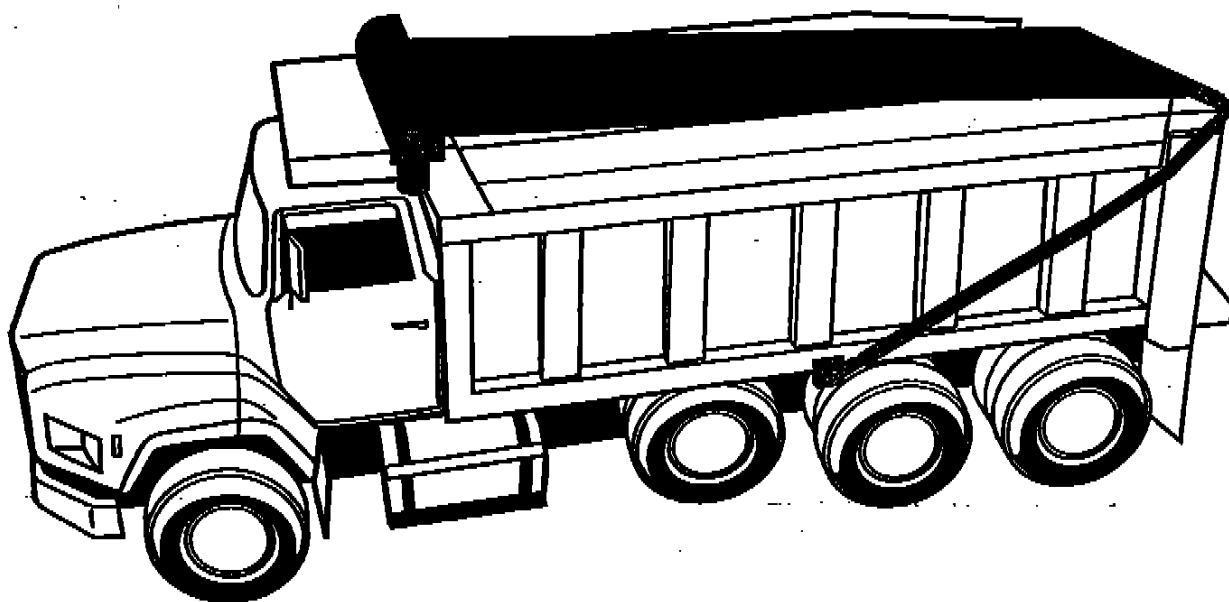


Easy Cover® 500/550/575

500 Series
(Model 500 V7.0, Model 550 V7.0
and Model 575 V1.0)

**Installation, Maintenance,
and Safety Instructions**

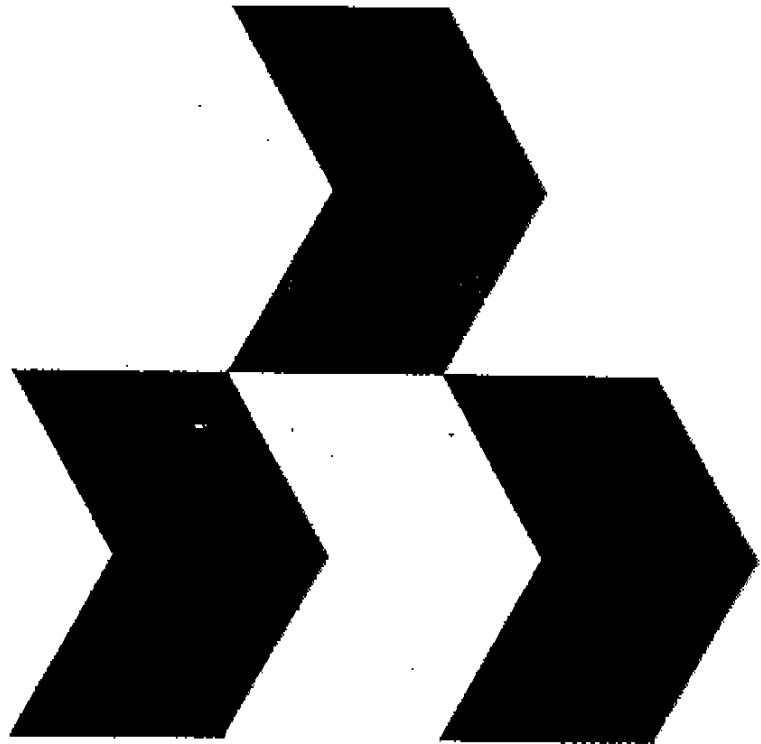


Attention Dealers:
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to the customer when the
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2

 **Aero**

Easy Cover® 500/550/575

Important: This manual explains how to install, operate, and maintain models 500 and 550. Before installing or operating the Easy Cover, read the entire manual.

Three kinds of special explanations will appear throughout the manual. These are Warning, Caution, and Note. Be sure to read and follow them.

⚠ Warning: Possible danger to the operator or a bystander. The operator or bystander could be injured if you ignore this information.

CAUTION: Risk to the product. If you ignore this information, the Easy Cover or the truck could be damaged.

Note: Contains additional information about a feature or step critical to the operation of the cover.

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Easy Cover® 500/550/575

If You Have Wind Deflector Go To Step 2

STEP 1

How to Install Tarp Housing

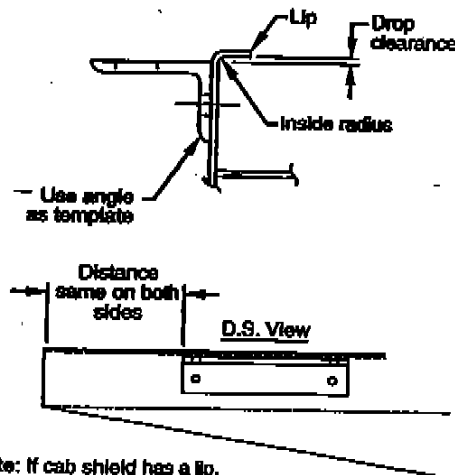
Parts you will need:

- 1/2" x 1" hex bolts (8)
- 1/2" x 1 1/2" hex bolts (4)
- rubber bushings (4)
- 1/2" hex nuts (8)
- 1/2" lock washers (16)
- 2" x 3" steel angles (4)

1. Refer to figure 1. Hold steel mounting angles up to cab shield. With angles as far forward as possible, and angle level with top edge of cab shield, trace through holes with permanent marker. Repeat on other side of cab shield.

Note: Angle will be mounted on inside of cab shield. Make sure to compensate height of angle for any lip or radius that may interfere with placement. If cab shield is large enough to allow drilling from the inside, place angles on inside of cab shield, mark and drill using 1/4" to 7/16" drill bit.

Figure 1

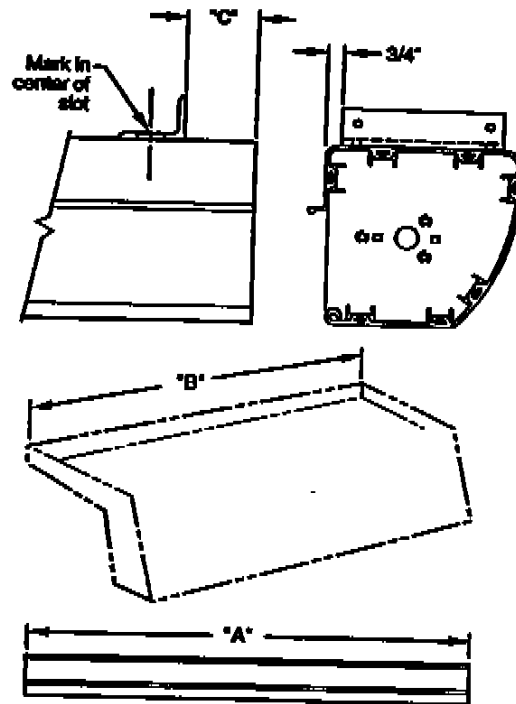


Note: If cab shield has a lip, make sure you drop angle far enough to compensate for inside radius of the lip

2. Refer to figure 2. Measure width of housing - dimension "A". Measure width of cab shield - dimension "B." Subtract B from A and divide by two to get dimension "C." Turn housing upside down. Lay steel angle until dimension C is maintained on both ends and mark in center of slotted hole. The slotted holes allow the tarp housing to be moved 1/2" (once mounted) to the left or right if measurements are not exact. Drill in marked holes using 1/2" to 7/16" drill bit.

Note: Make sure when drilling holes into the housing bottom that you stay far enough away from slotted channels to leave room to apply washers and nuts.

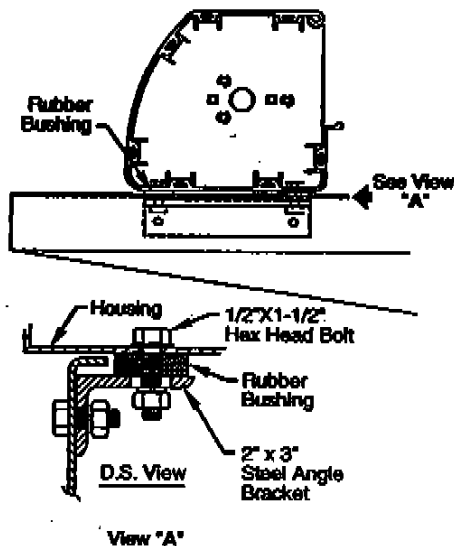
Figure 2



3. Refer to figure 3. Attach steel mounting angles to cab shield, then set housing (with rubber bushings) into the slotted holes and fasten securely. Rubber bushings should compress to about $\frac{3}{8}$ ". Tarp housing should not touch any part of cab shield in order to minimize vibration.

Caution: All tarp housing nuts and bolts must be checked for tightness every 3 months. Tighten as necessary.

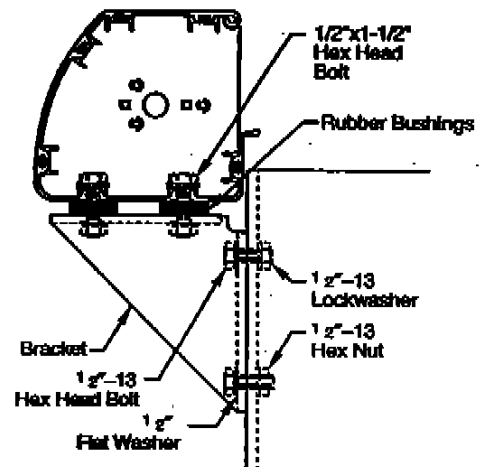
Figure 3



Trailer Mounting Instructions

1. Refer to figure 4. Turn housing upside down. Set brackets on housing so holes don't interfere with extruded channels inside the housing. Brackets should be placed approximately 12" in from each end of housing. Keeping brackets straight and parallel with end plates, mark holes through brackets and onto the bottom of the housing. Using $\frac{1}{2}$ " to $\frac{3}{8}$ " drill bit, drill all four holes. Attach brackets with $\frac{1}{2}$ " x $1\frac{1}{2}$ " bolts, nuts and washers and rubber bushings. Tighten until bushings compress to approximately $\frac{3}{8}$ " to $\frac{1}{2}$ ". Hold housing up to trailer firmly and trace lower holes. Drill using a $\frac{1}{2}$ " to $\frac{3}{8}$ " drill bit. Insert $\frac{1}{2}$ " x 5" bolts, nuts and washers. Tighten firmly.

Figure 4



(Now Go To Step 6)

Easy Cover® 500/550/575

STEP 2

How to Install the Mounting Plates and Wind Deflector

Parts you will need:

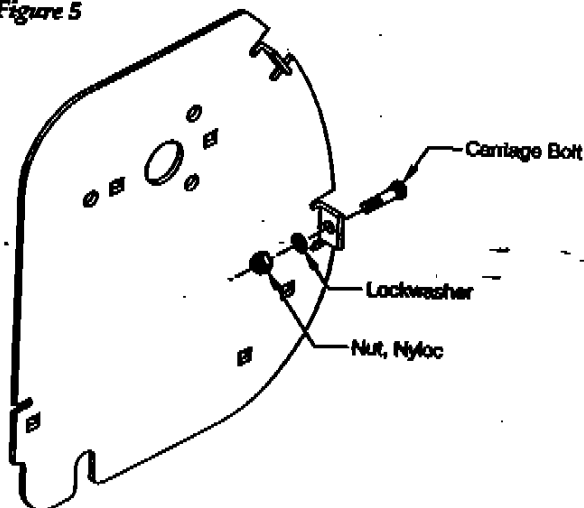
- Side mounting plates (2)
- $\frac{3}{8}$ " x 1" hex bolts (6)
- $\frac{3}{8}$ " hex nuts (6)
- $\frac{3}{8}$ " lock washers (6)

Note: If a mounting plate does not set squarely against the top rail, use shims to square the plate. Shim material is not included in the assembly package.

Warning: Before installing the mounting plates visually check the path of the mounting plate to the crank assembly. Make sure when the chain cover is assembled it does not obstruct the door or create a hazard to the operator.

1. Refer to figure 5. Install carriage bolts, lock washers and nylok nuts in the driver's side and passenger's side end plates as shown. Do not tighten.

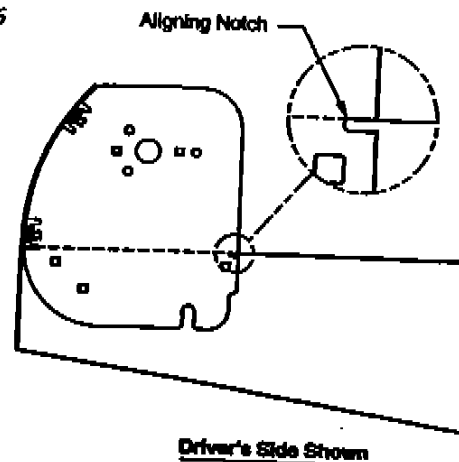
Figure 5



2. Slide end plates into wind deflector's extrusion. Do not tighten.
3. Carefully place assembly onto the cab shield or top rail and position at the farthest point forward. This will keep the air coming in under the wind deflector to a minimum.

4. Move the end plates inward until they are against the cab shield or top rail. Lift rear of assembly until alignment mark is even with the top rail. (See Figure 6). Clamp driver's side end plate into place.

Figure 6



Note: If the wind deflector is wider than your cab shield, you can leave the excess material hang over on each side, or measure cab shield width, add $\frac{3}{8}$ " to that measurement, and cut wind deflector to length.

5. Using the mounting plate as a template, drill three $\frac{3}{32}$ " holes through the top rail where square holes reside.
6. Bolt the mounting plate in place with the bolts, nuts, and lock washers.

STEP 3

How to Install the Roll-up Bar

Parts you will need:

- Roll-up bar (1)
- $\frac{1}{4}$ " hex nut (1)
- $\frac{1}{4}$ " x 2 $\frac{1}{4}$ " bolt (1)

1. Align the passenger's side plate with the driver's side plate as suggested in Step 2.1-2.2. Clamp the passenger's side plate in place. Refer to figure 7.
2. Refer to figure 7. Measure the distance between the driver's side and passenger's side plates. It must be at least 87". If it is not, place shims equally on both sides between the cab shield and the mounting plates to create this distance. Measure the final distance and remove the passenger's side plate.

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Figure 7

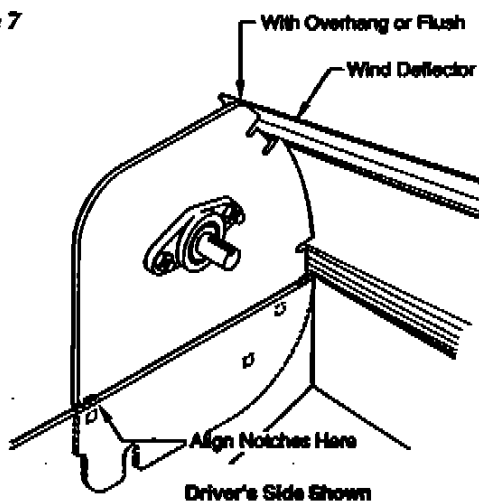
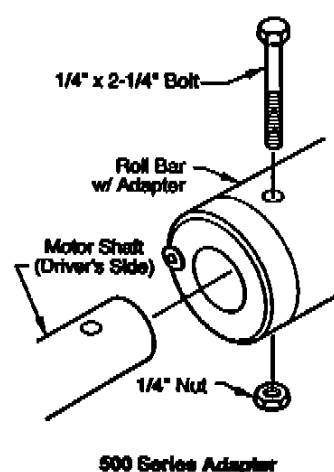
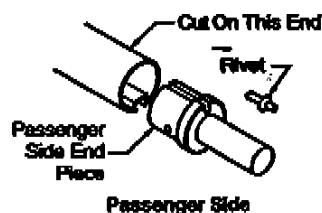


Figure 9



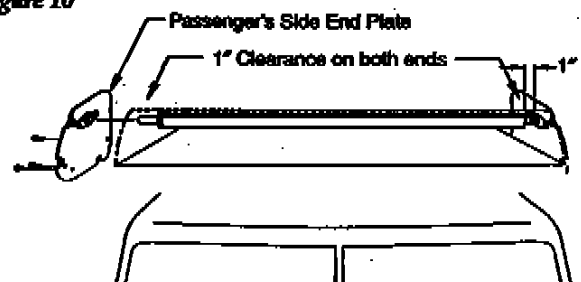
3. Refer to figure 8. Pull the passenger's side end piece out of the roll bar (it's the end with a short shaft sticking out). If the expansion rivet is holding the passenger's side end in place, the nail in the expansion rivet can be unscrewed from the rest of the expansion rivet. This allows the end to be removed. The expansion rivet and nail can be reused. Cut the roll bar $3\frac{1}{2}$ " less than the distance between the plates by cutting the extra length from the passenger's side. This dimension includes the driver's side end which should still be in place. Insert the square nuts into the channel. Reassemble the roll up bar.

Figure 8



4. Refer to figure 9. Slide the driver's side of the roll bar onto motor shaft. Align the holes in the shaft and the roll bar. Attach the roll bar to the motor with the $\frac{1}{4}$ " x $2\frac{1}{4}$ " bolt and $\frac{1}{4}$ " nut.
5. Refer to figure 10. Slide the passenger's side plate over the passenger's side shaft of the roll bar. Install the passenger's side end plate on the cab shield by copying Steps 2.3-2.5. Tighten the set screws on the passenger's side bearing. There should be 1" of clearance between the roll bar and the bearings.

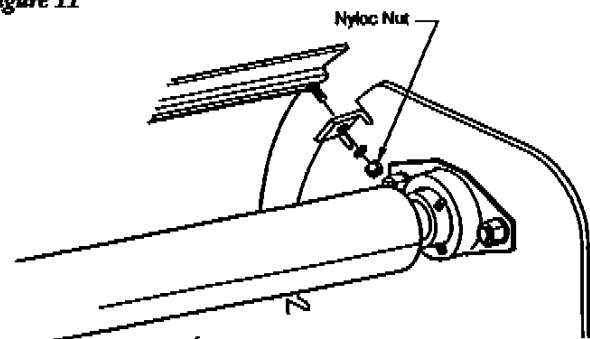
Figure 10



Note: If you are mounting the deflector somewhere other than across the front edge of the cab shield, you will have to place a support under the wind deflector to support the center of the deflector as well as to prevent air from getting under the tarp. Support is not included in the assembly package.

6. As a follow up to STEP 2.2, tighten nyloc nuts (4 places) using a $\frac{7}{16}$ " wrench. (See Figure 11.)

Figure 11



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STEP 4

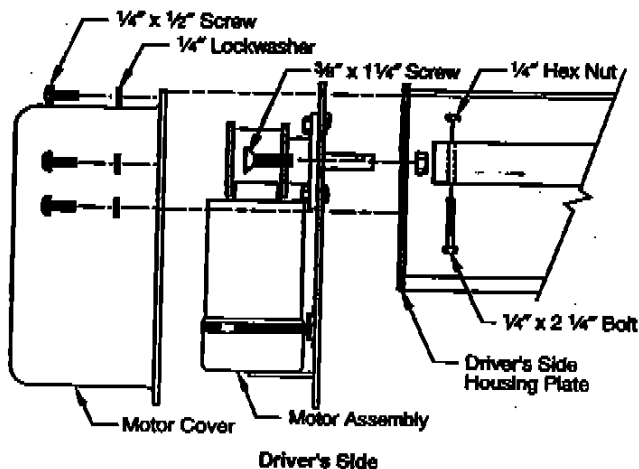
How to Install the Electric Motor and Roll-up Bar

Parts you will need:

Electric motor/mounting plate assembly (1)
 $\frac{3}{8}$ " x $1\frac{1}{4}$ " screw (4)
 $\frac{3}{8}$ " hex nut nylon (4)
 $\frac{3}{8}$ " flat washer (4)
 Flange bearing (1)
 $\frac{3}{8}$ " x 1" bolt (2)
 $\frac{3}{8}$ " hex nut (2)
 $\frac{3}{8}$ " washer (2)
 $\frac{1}{4}$ " x $2\frac{1}{4}$ " bolt (1)
 $\frac{1}{4}$ " hex nut (1)
 Key (1)

1. Take motor cover off of the electric motor assembly by removing the five screws on the outside of the cover. Lay screws aside for Step 5.
2. See Figure 12. Fasten the motor assembly to the driver's side housing plate using the $\frac{3}{8}$ " screw screws provided.

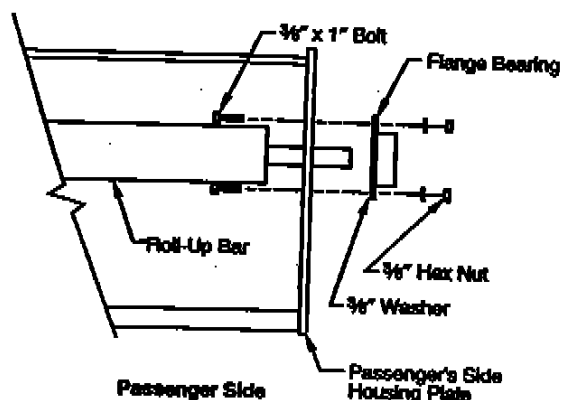
Figure 12



3. Remove the end of the roll bar as described in Step 3.3. Insert the square nuts into the channel. Reassemble the roll bar. The bar is already cut to fit the housing

4. Insert passenger side end of the roll-up bar into the passenger's side of the tarp housing. Now slide driver's side end of roll-up bar over motor shaft and line up hole in roll-up bar with hole in motor shaft. Fasten securely with $\frac{1}{4}$ " x $2\frac{1}{4}$ " bolt and $\frac{1}{4}$ " nut. (Refer to Figure 12)
5. See Figure 13. Slide bearing over roll-up bar shaft on passenger side. Fasten with $\frac{3}{8}$ " x 1" bolts, washers and nuts. Tighten both set screws on the bearing collar.

Figure 13



6. Replace cover on motor with the five $\frac{1}{4}$ " screws.

STEP 5

How to Install the Electrical Controls

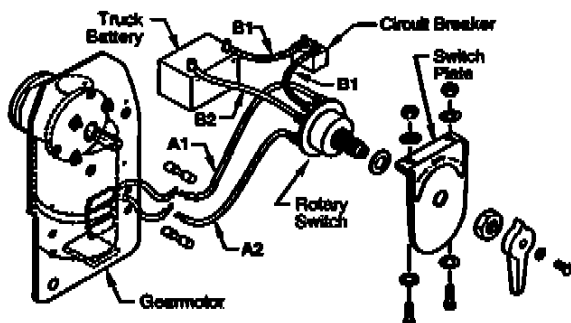
Parts you will need:

Rotary switch (1)
 Circuit breaker (1)
 Metal loom plastic clamps (12)
 #6 to #10 wire butt connectors (4)
 #6 x #10 ring connectors (6)
 #6 x $\frac{1}{8}$ " ring connectors (2)
 Mounting bracket (1)
 Rotary switch decal (1)
 $\frac{1}{4}$ " x $\frac{1}{4}$ " PHPH S/T screws (12)
 $\frac{1}{4}$ "-20 x $\frac{1}{4}$ " HHCS bolts (2)
 $\frac{1}{4}$ " flat washers (4)
 $\frac{1}{4}$ "-20 x $\frac{3}{4}$ " screws (2)
 $\frac{1}{4}$ "-20 hex nuts (2)
 Wiring diagram (1)

1. Refer to figure 14. Peel decal and place on the switch plate.

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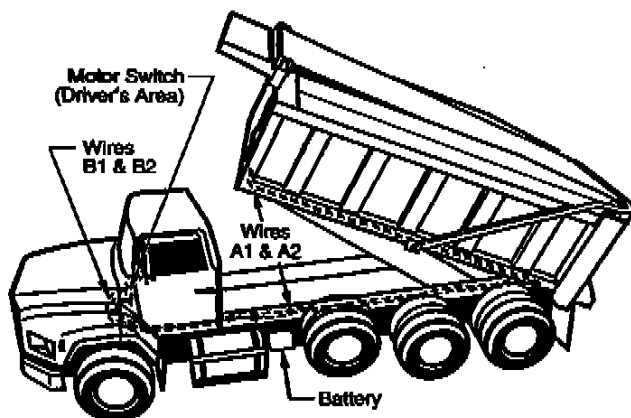
Figure 14



Note: Reference wiring diagram for additional information on wiring.

2. Find a convenient place, on the driver's side under the dashboard, to mount the switch plate. Using the switch plate as a template, mark and drill two holes for the $\frac{1}{4}$ " bolts.
3. Mount the switch plate using the $\frac{1}{4}$ " x $\frac{3}{4}$ " bolts, nuts and washers.
4. Remove the switch handle and fastening nut from the rotary switch. Pass the rotary switch's operating shaft through the hole in the switch plate from behind the plate. Replace the nut and tighten it to secure the switch to the plate. Replace the switch handle.
5. Refer to figure 15. Measure the wiring distance from the gearmotor to the pivot of the box, then from the pivot point through the truck body to the switch in the cab. If possible, run the wiring along an existing wiring harness.

Figure 15



6. Run the wiring from the gearmotor to the rotary switch. (See figure 15) Secure wire using metal loom clamps and screws provided. Run wire to protected locations avoiding pinch points and sharp objects.
7. Fasten the two gearmotor leads to the ends of wire. (See figure 14) This connection should be made with two butt connectors.
8. Fasten #6 x #10 ring terminals to the ends of wire A1 and A2, at the switch, attach these two ring terminals to the marked terminals of the rotary switch.
9. Measure the wiring distance between the rotary switch and the truck's battery. If possible, run the wiring along an existing wiring harness.
10. Run wiring to the truck's battery.
11. Fasten #6 x #10 ring terminals to the ends of wire B1 and B2, at the switch, connect these ends to the marked terminals on the rotary switch.

CAUTION: Incorrect wiring can cause failure to the Easy Cover system and possible harm to the operator.

12. Separate wire at battery approximately 12" back.
13. Fasten a #6 x $\frac{3}{4}$ " ring terminal to both wires B1 and B2.
14. Pick a convenient location to install circuit breaker along wire B1. (See figure 14)
15. Cut wire B1 and attach circuit breaker using two butt connectors.

Warning: Circuit breaker must be properly installed or motor warranty is void.

16. Connect wire B1 to positive terminal and connect wire B2 to negative terminal.

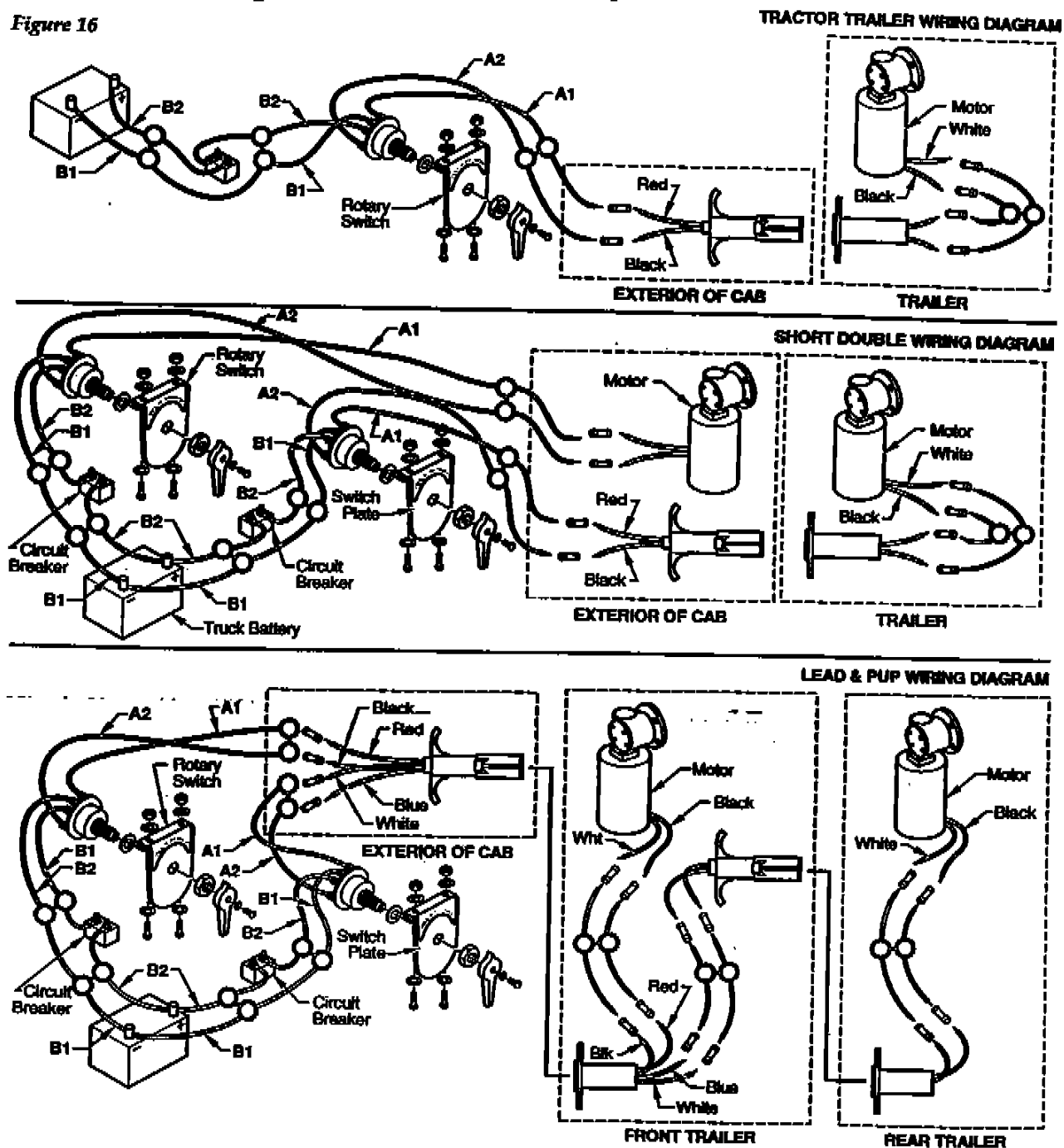
Note: Test wiring by moving the rotary switch handle to "Cover" and "Uncover." If operation is reversed, reverse polarity at A1 and A2.

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STEP 6

How to Install Optional Electrical Controls

Figure 16

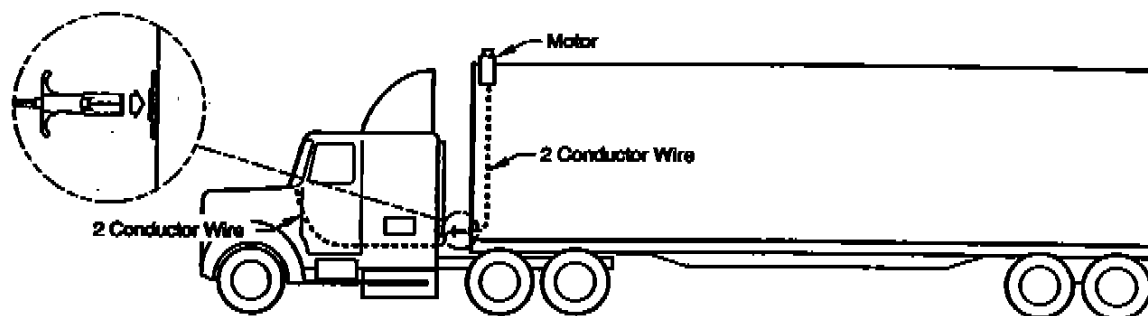


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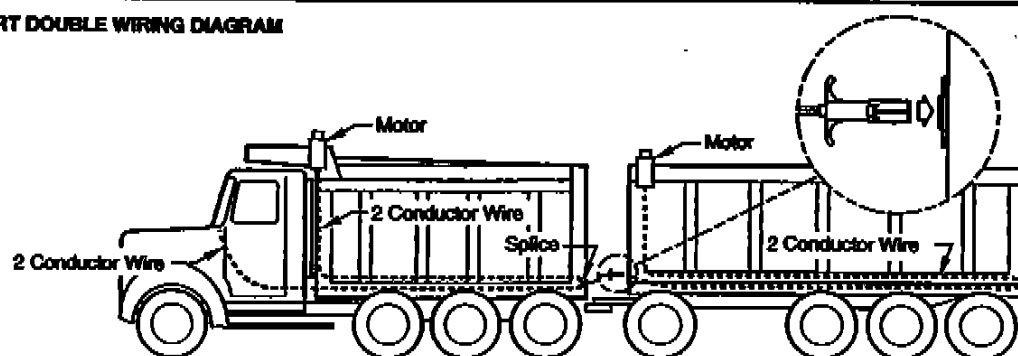
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Figure 17

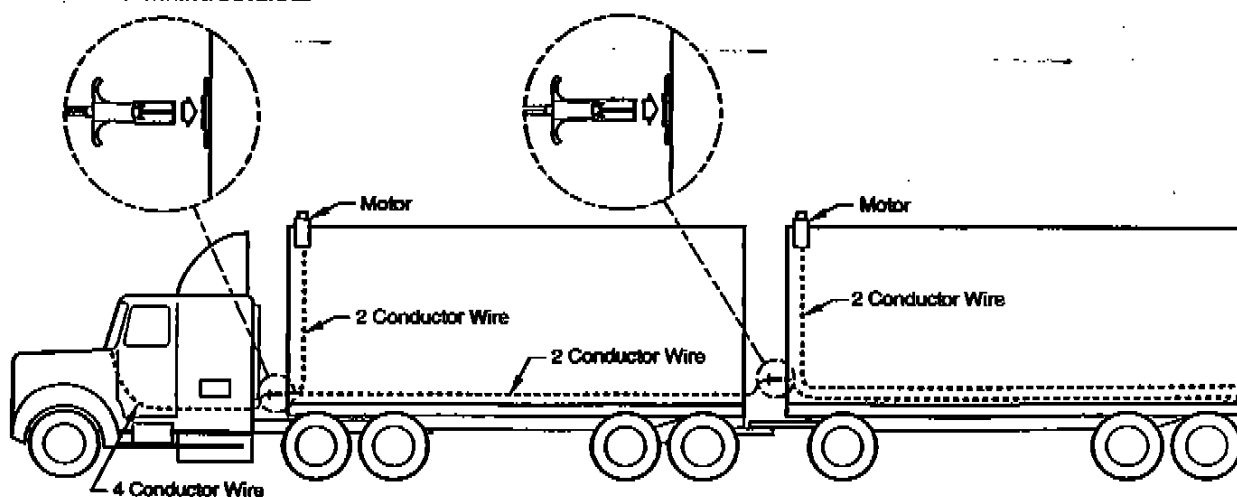
TRACTOR TRAILER WIRING DIAGRAM



SHORT DOUBLE WIRING DIAGRAM



LEAD & PUP WIRING DIAGRAM



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Easy Cover® 500/550/575

If You Have An Undermount Spring Assembly, Go to Step 7.

If You Have An Underbody Spring Assembly, Go To Step 8.

STEP 7

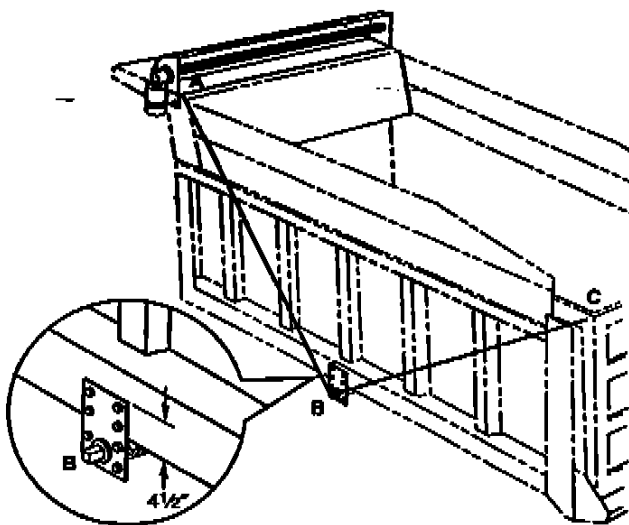
How to Install the Undermount Tension Spring Assembly Option

Parts you will need:

- Tension spring assembly (driver's side) (1)
- Tension spring assembly (passenger side) (1)
- $\frac{3}{8}$ " x 1" hex bolts (4)
- $\frac{3}{8}$ " hex nuts (4)
- $\frac{3}{8}$ " lock washers (4)
- Mounting Plate D.S. (1)
- Mounting Plate P.S. (1)

Note: Refer to figure 18. Notice that the tension spring assembly (B) is one point of a triangle. The other two points (A and C) are on the top of the truck. The two downward-pointing legs of the triangle must be the same length. These steps will make sure that the two legs are equal.

Figure 18

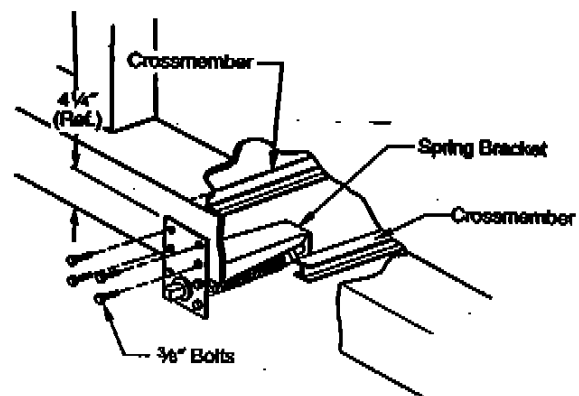


1. Mark the rear edge of the crank assembly or the mounting plate in line with the tarp roll-up bar on the driver's side and passenger's side. Mark these points and call them A.
2. Determine where you want the rear of the tarp to be when it fully covers the box. Mark these points and call them C.
3. Find a point at the side of the box that is the same distance from A and C. This is point B, where the tension spring assembly will be mounted. Mark this point on both sides.

Note: The tension spring assembly mounting plate can be either bolted or welded to the box or bottom rail. Aero Industries recommends that the plate be bolted.

4. Position the driver's side tension spring assembly to the point marked on the driver's side ("B"). Clamp the spring assembly into position centering the mounting plate on point B. The top of the mounting plate should be $4\frac{1}{4}$ " above the bottom of the box. (See Figure 18)
5. Drill two $\frac{13}{16}$ " holes.
6. Bolt the tension spring assembly to the box or rail, using the $\frac{3}{8}$ " bolts. (See Figure 19)

Figure 19



STEP 8

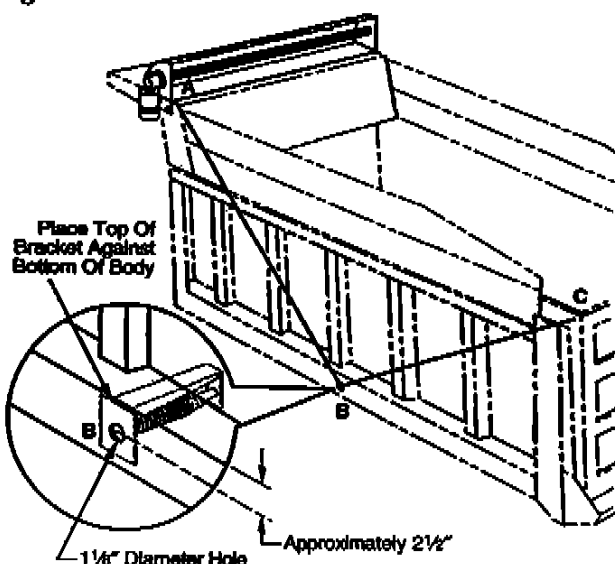
How to Install the Underbody Spring Assembly Option

Parts you will need:

- 1 1/8" diameter hole saw
- Tension spring assembly (driver's side) minus mounting plate (1)
- Tension spring assembly (passenger side) minus mounting plate (1)
- 3/8" x 1" hex bolts (4)
- 3/8" hex nuts (4)
- 3/8" lock washers (4)

Note: Refer to Figure 20. Notice that the tension spring assembly (B) is one point of a triangle. The other two points (A and C) are on the top of the truck. The two downward-pointing legs of the triangle must be the same length. These steps will make sure that the two legs are equal.

Figure 20



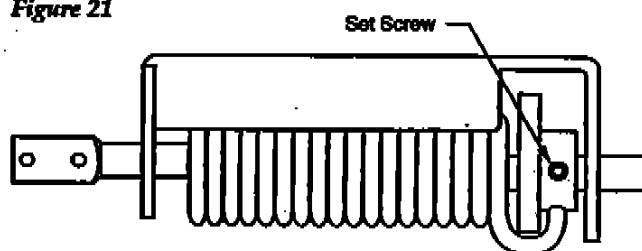
1. Mark the rear edge of the crank assembly or the mounting plate in line with the tarp roll-up bar on the driver's side and passenger's side. Mark these points and call them A.
2. Determine where you want the rear of the tarp to be when it fully covers the box. Mark these points and call them C.

3. Find a point at the side of the box that is the same distance from A and C. This is point B, where the tension spring assembly will be mounted. Mark this point on both sides.

Note: The tension spring assembly can be either bolted or welded to the box or bottom rail. Aero Industries recommends that the plate be bolted.

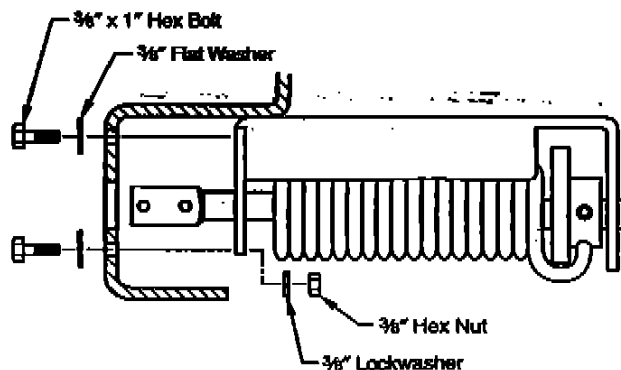
4. Loosen set screw at rear of assembly. (See Figure 21) Pull spring support shaft out from the front of the assembly.

Figure 21



5. Place tension spring assembly housing up underneath the dump body aligned at point B. Rest the top edge of the tension spring housing assembly against the bottom of the dump body. (See Figure 22) Once in position, trace the holes in the spring housing onto the dump body.

Figure 22



6. Drill four 1/8" holes and the 1 1/8" diameter hole with the hole saw.

CAUTION: When drilling through an aluminum body with hole saw, apply medium pressure to drill, if too much pressure is applied, hole saw will grab and twist drill.

STEP 9

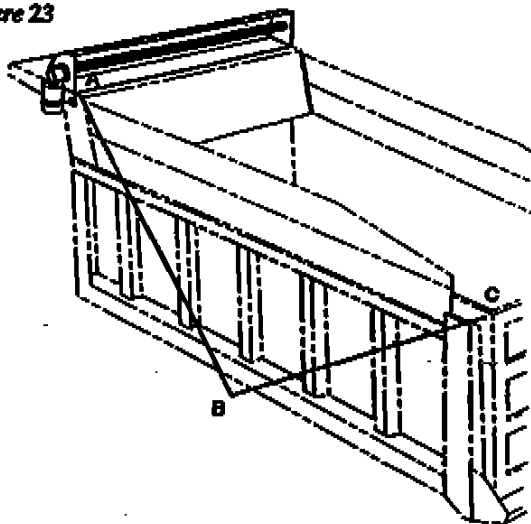
How to Install the Power Pack Tension Spring Assembly

Parts you will need:

- Mounting brackets (2)
- Male arm casting (2)
- Female arm casting (2)
- External retaining ring (2)
- Plastic bushing (4)
- 1 1/4" flat washer (4)
- 3/8" x 2" self tapping bolts (4)
- 1/2" x 1 3/4" flat head bolts (4)
- 1/2" nuts (4)

Note: Refer to figure 23. Notice that the tension spring assembly (B) is one point of a triangle. The other two points (A and C) are on the top of the truck. The two downward-pointing legs of the triangle must be the same length. These steps will make sure that the two legs are equal.

Figure 23



1. Mark the rear edge of the crank assembly or the mounting plate in line with the tarp roll-up bar on the driver's side and passenger's side. Mark these points and call them A.
2. Determine where you want the rear of the tarp to be when it fully covers the box. Mark these points and call them C.
3. Find a point at the side of the box that is the same distance from A and C. This is point B, where the tension spring assembly will be mounted. Mark this point on both sides.

4. Install the mounting bracket so the groove in the shaft is parallel with bottom rails using the 1/2" x 1 3/4" flat head bolts. The bolts are installed by drilling a 1/2" hole through the two middle holes and installing the bolts. Shaft should lie on point B.

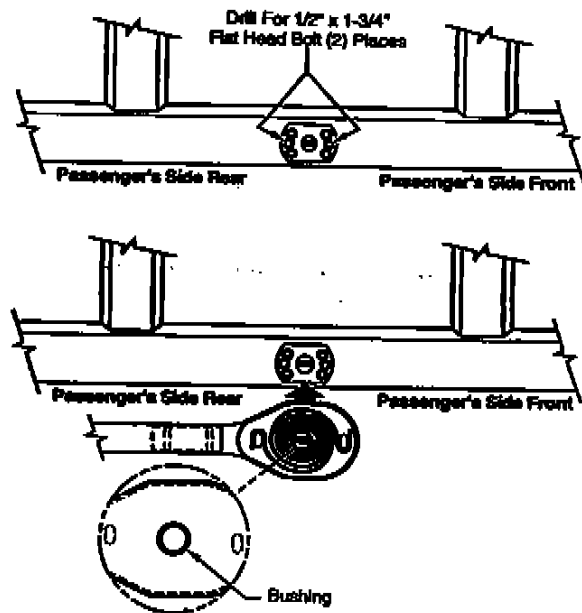
5. Place springs in castings in the position shown in figures 24a and 24b.

Note: If you wish to install the arm with the flat side to the rear, the castings may be swapped. The spring must be positioned as shown (open end of rear hook down).

CAUTION: It is extremely important that you install the springs as indicated in figure 24a and 24b. If springs are installed incorrectly, springs will be damaged beyond repair and spring warranty will be void.

6. Press plastic bushings in center holes, both sides.
7. On the mounting bracket shaft, in this order, place a 1 1/4" flat washer, then the arm assembly, another 1 1/4" flat washer, and then fasten with an external retaining ring.

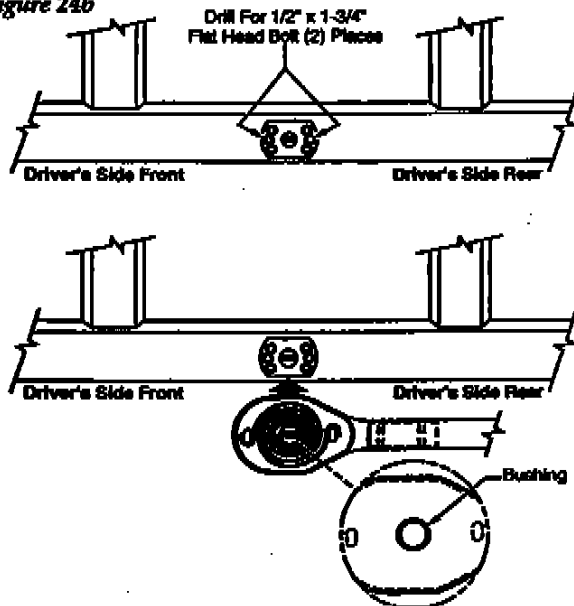
Figure 24a



8. Fit the end of the swing arm with the untapped holes over the end of the casting assembly. Align the holes in the arm and the casting.

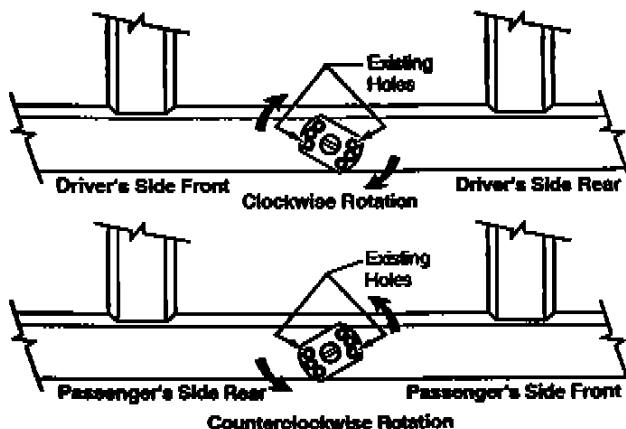
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Figure 24b



9. Insert the self tapping bolts through the holes in the arm. Drive the self tapping bolts into the casting assembly with an air wrench to lock the arm to the casting.
10. If more spring tension is desired, remove bolts from mounting brackets on driver's side of truck, rotate bracket 30° clockwise, so next set of holes lines up with existing holes in truck body. Then, re-install bolts. See Figure 25. Repeat procedure for passenger's side *except* rotate bracket counter-clockwise.

Figure 25



If You Have Aluminum Or Steel Swing Arms With An Undermount Or Underbody Spring, Go To Step 10.
If You Have A Sidemount Spring Assembly, Go To Step 11.

STEP 10

How to Install the Swing Arms

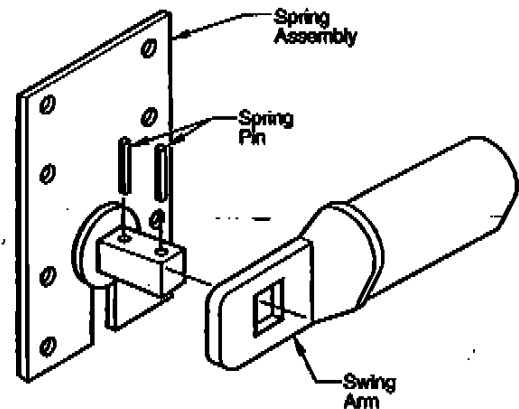
Note: This step is the same for aluminum or steel arms with undermount or underbody spring.

Parts you will need:

- Swing arms (2)
- 1/4" spring pins (2)

1. Refer to figure 26. Place a swing arm on the driver's side tension spring assembly shaft. Be sure that the arm is in the rear position. If the arm and shaft do not line up, rotate the square shaft slightly counter-clockwise until they do line up.

Figure 26



2. Drive a roll pin into the shaft to hold the swing arm.
3. Repeat instructions 1 and 2 on the passenger side.

Note: On rare occasions, the tension spring assembly may not have enough tension to pull the tarp to the rear of the truck. Test the completed tarp system. If the tension is not sufficient, take the arms apart and preload the tension spring assemblies by turning the shafts 1/4 turn towards the front and then reattaching the swing arms.

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STEP 11

How to Assemble the Swing Arms to the Power Pack Casting Assemblies

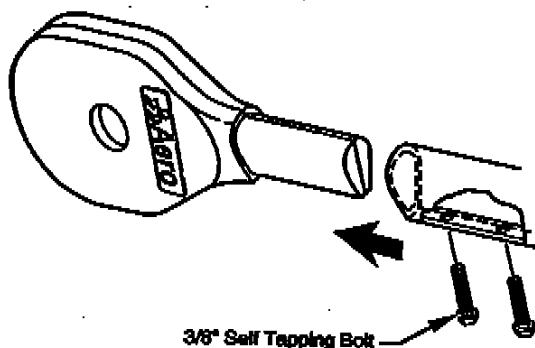
Parts you will need:

- Swing arm, driver's side (1)
- Swing arm, passenger side (1)
- $\frac{1}{4}$ " Self tapping bolt (4)

Note: During this phase of installation, swing arms must be in the rear position, pointing toward the back of the truck.

1. Refer to figure 27. Slide each swing arm onto the casting so holes in casting and swing arm line up. Insert self tapping bolts and secure tightly.

Figure 27



(Driver's side)

If You Have Aluminum Swing Arms, Go To Step 12.

If You Have Steel Swing Arms, Go To Step 13.

If You Have Steel Swing Arms With Sidemount Spring, Go To Step 14.

STEP 12 Aluminum

How to Install the Cross Arm and Connecting Arms

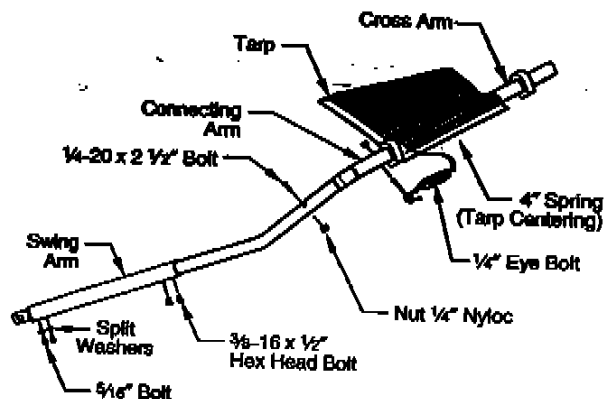
Parts you will need:

- Tarp (1)
- Cross arm (1)
- Lower swing arm (2)
- Upper swing arm, driver's side (1)
- Upper swing arm, passenger's side (1)
- 4" tarp-centering springs (2)
- $\frac{1}{4}$ " eye bolts (2)
- $\frac{1}{4}$ " Nyloc nuts (4)
- $\frac{1}{16}$ " split lock washers (8)
- $\frac{1}{4}$ " hex bolts (4)
- ArmGuard Rubber Bumpers (2)
- Mild soap and water mixture (optional)

Note: The driver's side and passenger side arm assemblies can be interchanged to provide greater clearance with the box. Each connecting arm has a different part number. Before ordering replacement parts, double-check the part number. (See the assembly drawing at the back of the manual.)

1. Refer to figure 28. Feed the cross arm through the pocket in the end of the tarp.

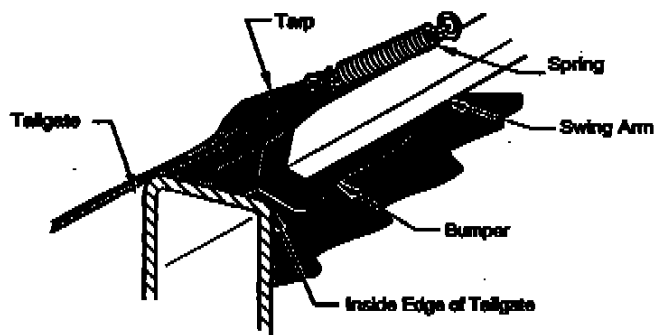
Figure 28



2. Slide both upper arms onto the cross arm.
3. Raise the swing arm to the top of the tailgate and slide the ends of the upper arms over the lower arm.

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4. Square the tarp and the rear cross bar with the top of the tail-gate.
5. Fasten the lower arms to the upper arms with $\frac{3}{8}$ " x $\frac{1}{2}$ " hex bolts.
6. Center the tarp from side to side on the rear cross bar.
7. Measure 3" from the edge of the tarp on both sides. Drill a $\frac{3}{8}$ " horizontal hole through the connecting arm and the cross arm. Do not drill through the tarp.
8. Before installing eyebolts and springs, slide rubber bumper over each end of cross arm and position inside of notch in tarp. Position bumpers to rest on tailgate as shown below.



Note: ArmGuard rubber bumpers can be used on swing arms as well. ArmGuard rubber bumpers help prevent swing arm and dump body damage during motion.

9. Fasten the cross arms with eye bolts and nyloc nuts.
10. Attach the spring to the grommet in each corner of the tarp and to the eye bolt. Crimp the ends of the springs.

STEP 13 Steel

How to Install the Cross Arm and Connecting Arms

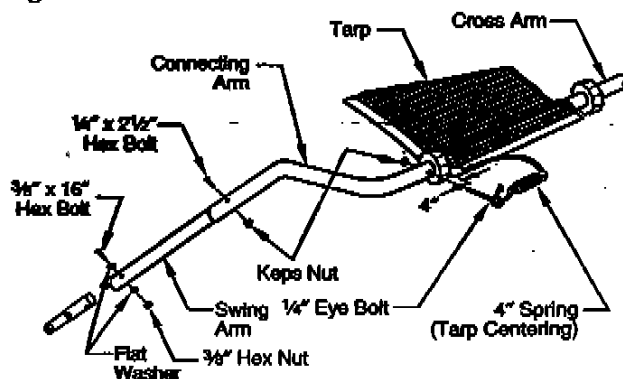
Parts you will need:

Tarp (1)
 Cross arm (1)
 Connecting arm, driver's side (1)
 Connecting arm, passenger side (1)
 4" tarp-centering springs (2)
 $\frac{1}{4}$ " x 2 $\frac{1}{2}$ " hex bolt (2)
 $\frac{1}{4}$ " x $\frac{1}{4}$ " self-tapping Phillips screws (6)
 $\frac{1}{4}$ " eye bolts (2)
 $\frac{1}{4}$ " Keps nuts (4)
 ArmGuard Rubber Bumpers (2)
 Mild soap and water mixture (optional)

Note: The driver's side and passenger side connecting arms can be interchanged to provide greater clearance with the box. Each connecting arm has a different part number. Before ordering replacement parts, double-check the part number. (See the assembly drawing at the back of the manual.)

1. Refer to figure 29. Feed the cross arm through the pocket in the end of the tarp.

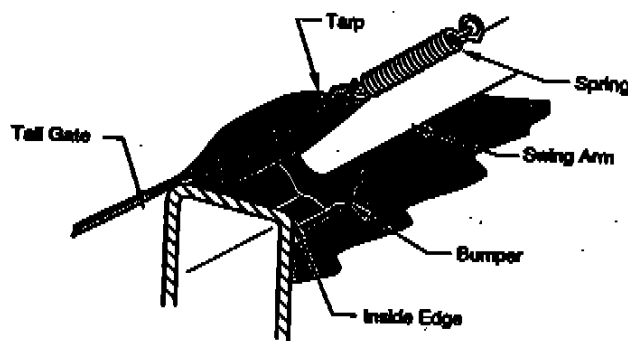
Figure 29



2. Slide both connecting arms onto the cross arm.
3. Raise the swing arm to the top of the tailgate and slide the ends of the connecting arms over the swing arm.
4. Square the tarp and the rear cross bar with the top of the tail-gate.

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5. Drill a $\frac{1}{8}$ " hole through each swing arm using the holes in the connecting arms as guides.
6. Fast the swing arms to the connecting arms with $\frac{1}{4}$ " x $2\frac{1}{2}$ " hex bolts.
7. Center the tarp from side to side on the rear cross bar.
8. Measure 4" from the edge of the tarp on both sides. Drill a $\frac{1}{8}$ " horizontal hole through the connecting arm and the cross arm. Do not drill through the tarp.



9. Before installing eyebolts and springs, slide rubber bumper over each end of cross arm and position inside of notch in tarp. Position bumpers to rest on tailgate as shown below.
- Note: ArmGuard rubber bumpers can be used on swing arms as well. ArmGuard rubber bumpers help prevent swing arm and dump body damage during motion.*
10. Refasten the arms with eye bolts and keps nuts.
 11. Attach the spring to the grommet in each corner of the tarp and to the eye bolt. Crimp the ends of the springs.

STEP 14 Steel Sidemount

How to Install the Cross Arm and Connecting Arms

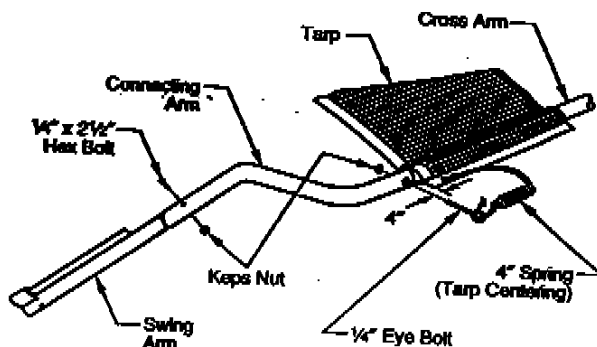
Parts you will need:

- Tarp (1)
- Cross arm (1)
- Connecting arm, driver's side (1)
- Connecting arm, passenger side (1)
- 4" tarp-centering springs (2)
- $\frac{1}{4}$ " x $2\frac{1}{2}$ " hex bolts (2)
- $\frac{1}{4}$ " x $\frac{1}{4}$ " self-tapping Phillips screws (6)
- $\frac{1}{4}$ " eye bolts (2)
- $\frac{1}{4}$ " Keps nuts (4)
- ArmGuard Rubber Bumpers (2)
- Mild soap and water mixture (optional)

Note: The driver's side and passenger side connecting arms can be interchanged to provide greater clearance with the box. Each connecting arm has a different part number. Before ordering replacement parts, double-check the part number. (See the assembly drawing at the back of the manual.)

1. Refer to figure 30. Feed the cross arm through the pocket in the end of the tarp.

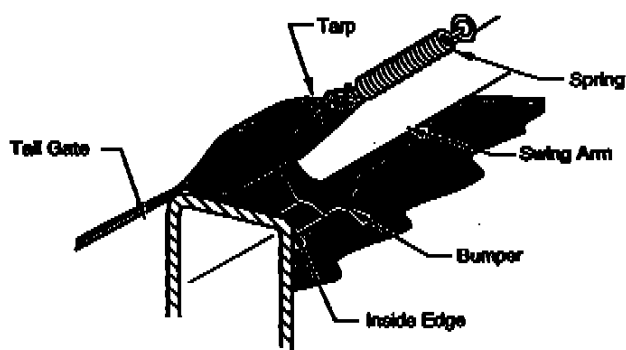
Figure 30



2. Slide both connecting arms onto the cross arm.
3. Raise the swing arm to the top of the tailgate and slide the ends of the connecting arms over swing arm.
4. Square the tarp and the rear cross bar with the top of the tailgate.

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5. Drill a $\frac{3}{16}$ " hole through each swing arm using the holes in the connecting arms as guide.
6. Fasten the swing arms to the connecting arms with $\frac{1}{4}$ " x 2 $\frac{1}{2}$ " hex bolts.
7. Center the tarp from side to side on the rear cross bar.
8. Measure 4" from the edge of the tarp on both sides. Drill a $\frac{3}{16}$ " horizontal hole through the connecting arm and the cross arm. *Do not drill through the tarp.*



9. Before installing eyebolts and springs, slide rubber bumper over each end of cross arm and position inside of notch in tarp. Position bumpers to rest on tailgate as shown below.

Note: ArmGuard rubber bumpers can be used on swing arms as well. ArmGuard rubber bumpers help prevent swing arm and dump body damage during motion.

10. Fasten the arms with eye bolts and keps nuts.
11. Attach the spring to the grommet in each corner of the tarp and to the eye bolt. Crimp the ends of the springs.

STEP 15

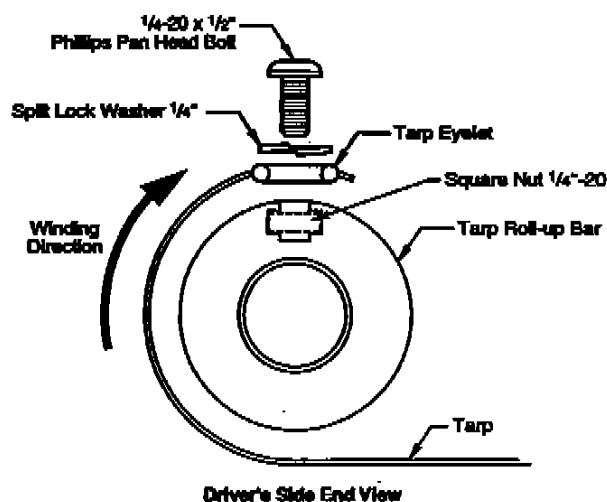
How to Install the Tarp

Parts you will need:

- $\frac{1}{4}$ " pan head bolts (6)
- $\frac{1}{4}$ " nut squares (6)
- $\frac{1}{4}$ " split lock washers (6)

1. Refer to figure 31. Pull the loose end of the tarp under the tarp roll-up bar, winding from the underside. Make sure the tarp is centered from side to side.

Figure 31



CAUTION: The tarp must be rolled from underneath for the cranking system to operate.

2. Mark the tarp roll-up bar for fastener placement using the grommets in the tarp as a guide.
3. Apply fasteners as shown in Figure 31.

How to Operate the Tarp System

How to Uncover the Load

1. Turn the switch to roll up the tarp. Release the switch when the tarp reaches the front of the truck.

How to Cover the Load

1. Turn the switch to roll out the tarp. Release the switch when the tarp reaches the tailgate.

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Safety Considerations

- ⚠ **Warning:** Never operate the tarp system under obstructions, such as trees or power lines.
- ⚠ **Warning:** Always check to make sure that no one is at the rear of the box or in the immediate area of the tarp as it operates. Keep everyone clear of the area.
- ⚠ **Warning:** Make sure that all safety guards are in place before operating the tarp system.
- ⚠ **Warning:** Keep all clothing clear of moving parts.
- ⚠ **Warning:** Make sure the hand crank is removed before covering the load.
- ⚠ **Warning:** Be sure that your working platform is secure as you work on the truck. Use OSHA approved ladders or scaffolding to work above ground level.

How to Maintain the Easy Cover

Minimal maintenance is required for the Easy Covers. Individual usage and operating conditions will determine when to check the Easy Cover. Aero Industries recommends a weekly inspection of the following items:

- Ⓒ **Bearings:** Pull the shafts from side to side and in and out. If there is excessive play, replace the bearings. Lubricate as often as necessary with penetrating oil. Operating conditions will determine how often to lubricate. Do not use an excessive amount of lubricant.
- Ⓒ **Chain and Springs:** Check the chain for a broken master link and for excessive stiffness. Lubricate the chain regularly with a penetrating oil. Examine springs for breakage or stretching. Lubricate the tension springs with penetrating oil as often as conditions dictate.
- Ⓒ **Screws:** Make sure that all mounting bolts and screws are in place and tight and that no parts are worn or damaged.
- Ⓒ **General:** Replace all worn or broken parts immediately.

Replacement parts may be obtained from the dealer or by contacting Aero Industries.

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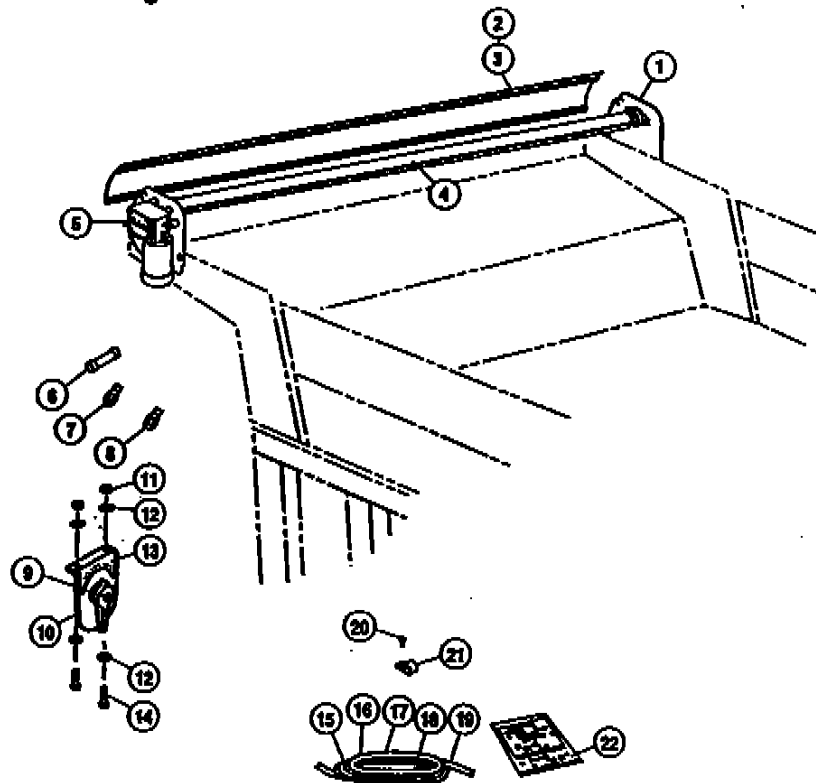
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Easy Cover® 500/550/575

Wind Deflector and Mounting Plates



No.	Part No.	Description	Qty.	No.	Part No.	Description	Qty.
1	0311-961844	Mounting Plate P.S.	1	12	0820-680410	Washer Flat 1/4" Zinc	4
2	0311-961845	Wind Deflector	1	13	0920-590400	Switch Bracket Decal	1
3	0311-961846	Wind Deflector	1	14	0810-600004	Screw Hex Head 1/4-20 x 3/4" Zinc	2
4	0311-961287	Roll Up Bar	1	15	0755-626535	#6 Wire - 50 Feet	1
5	0311-961847	Mounting Plate Assy. D.S.	1	16	0755-626536	#6 Wire - 60 Feet	1
6	0855-626500	Buff Connector #6 Wire to #10	2	17	0755-626537	#6 Wire - 70 Feet	1
7	0755-626507	Ring Terminal #6 Wire to #10 Screw	6	18	0755-626538	#6 Wire - 80 Feet	1
8	0755-626503	Ring Terminal #6 Wire to 3/8" Screw	2	19	0755-626539	#6 Wire - 90 Feet	1
9	0755-623456	Switch Rotary	1	20	0825-670551	Screw PH 1/4-20 x 3/4 Type F Zinc	12
10	0755-619611	Switch Mounting Bracket	1	21	0850-603757	Metal Loop Clamp	12
11	0815-660451	Nut 1/4-20 Nylon Insert	2	22	0930-861612	Wiring Diagram	1

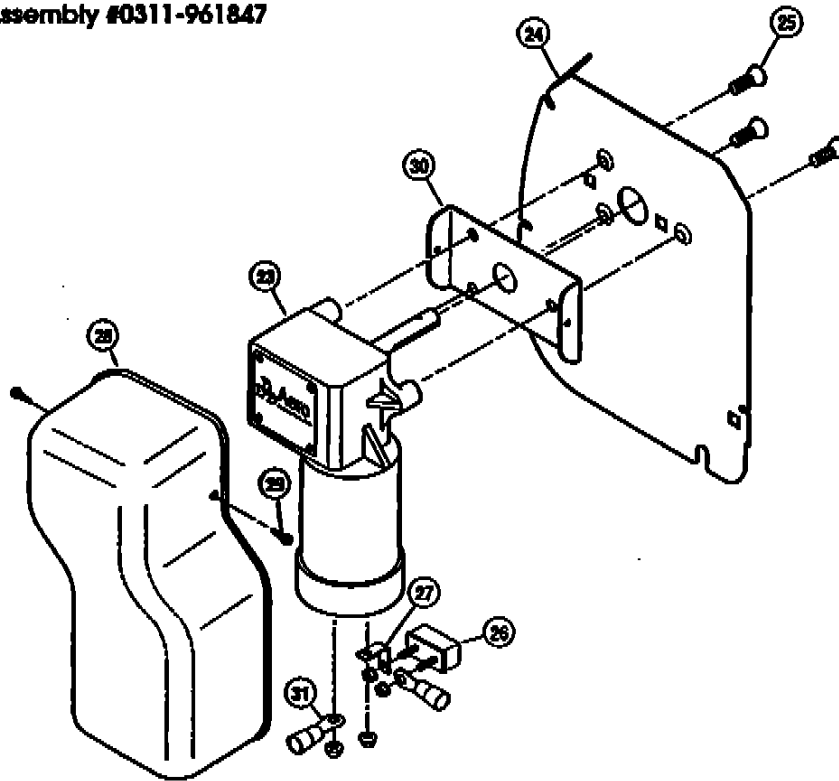
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Electric Motor Assembly #0311-961847



Electric Motor Assembly Part #0311-961847

No.	Part No.	Description	Qty.
23	0755-960280	Motor Powerplus 358RL	1
24	0311-861839	Mounting Plate D.S. PA	1
25	0825-650887	Screw 5/16-18 x 7/8" FHSA	3
26	0755-623501	Circuit Breaker, 40 Amp	1
27	0755-623461	Bus Bar, Formed	1
28	0311-860614	Motor Cover, Large A	1
29	0825-670375	Screw #10 x 1/2" SHWH AB	2
30	0311-860690	Bracket, Motor Cover MD	1
31	0755-626804	Wire End #6 x 1/4"	2

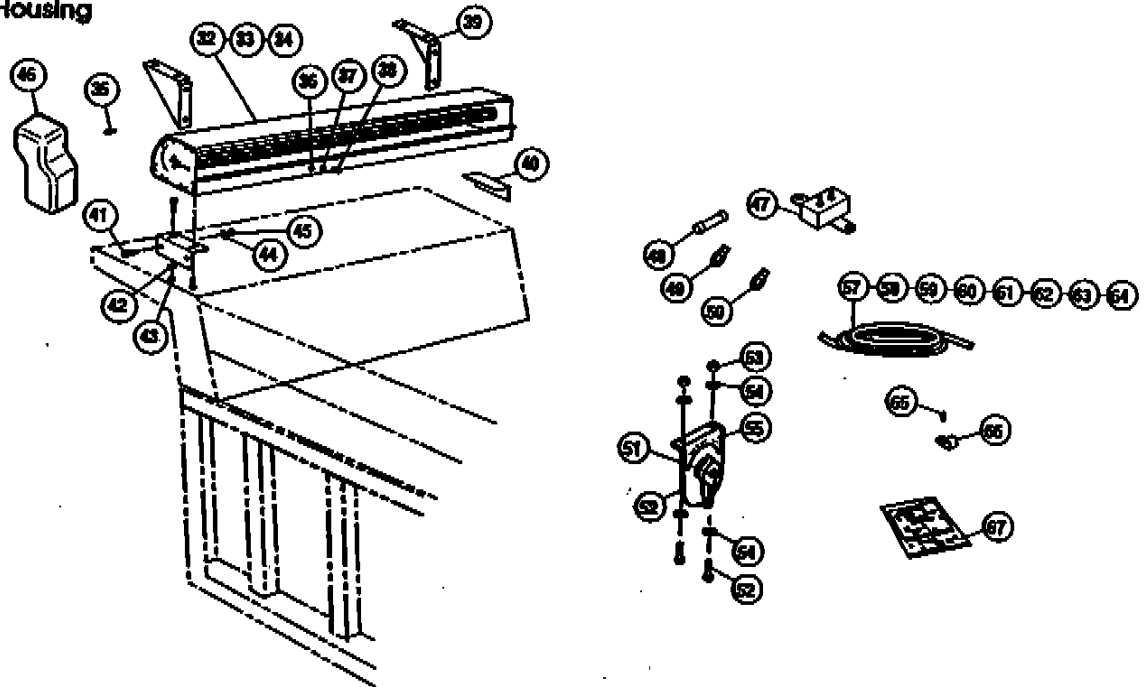
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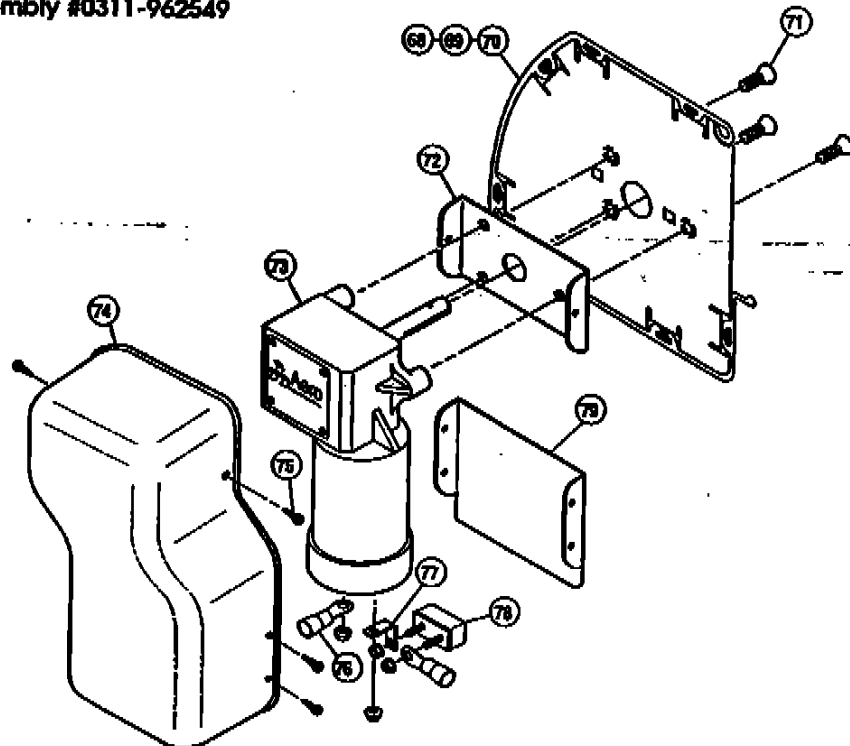
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Easy Cover[®] 500/550/575

Tarp Housing



Electric Motor Assembly #0311-962549



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Electric Motor Assembly Part #0311-962549			Electric Motor Assembly Part #0311-962549		
No. Part No.	Description	Qty.	No. Part No.	Description	Qty.
32 0311-961860	Tarp Housing Assy Bec 92"	1	68 0311-961860	Tarp Housing Assy Bec 92"	1
33 0311-961861	Tarp Housing Assy Bec 96"	1	69 0311-961861	Tarp Housing Assy Bec 96"	1
34 0311-961862	Tarp Housing Assy Bec 102"	1	70 0311-961862	Tarp Housing Assy Bec 102"	1
36 0840-618512	Key 1/4" x 1 1/2" Zinc	1	71 0825-650887	Screw 5/16-18 x 7/8" H-SA	3
37 0816-660702	Nut Square 1/4-20 Zinc	6	72 0311-860690	Bracket, Motor Cover MD	1
38 0820-680726	Washer Split Lock 1/4" Zinc	6	73 0755-960280	Motor Powerplus 358RL	1
39 0311-860485	Mounting Bracket Trailer	2	74 0311-860614	Motor Cover, Large A	1
40 0311-860481	Mounting Bracket	2	75 0825-670375	Screw #10 x 1/2" SH-WH AB	2
41 0810-670700	Bolt 1/2"-13 x 1" Grade 5 Zinc	8	76 0755-626504	Wire End #6 x 1/4"	2
42 0820-680910	Washer Flat	8	77 0755-623461	Bus Bar, Formed	1
43 0815-650512	Nut 1/2"-13	8	78 0755-623501	Circuit Breaker, 40 Amp	1
44 0820-680620	Flat Washer 1/2"	4	79 0311-860691	Filter Plate	1
45 0815-660660	Nyloc Hex Nut 3/8-16 Zinc	6			
46 0311-962549	Motor Assy, Power Plus 358	1			
47 0755-623510	Circuit Breaker 25 Amp	1			
48 0855-626800	Built Connector #6 Wire to #10	2			
49 0755-626807	Ring Terminal #6 Wire to #10 Screw	6			
50 0755-626503	Ring Terminal #6 Wire to 3/8" Screw	2			
51 0755-623456	Switch Rotary	1			
52 0755-619511	Switch Mounting Bracket	1			
53 0815-660451	Nut 1/4-20 Nylon Insert	2			
54 0820-680410	Washer Flat 1/4" Zinc	4			
55 0920-590400	Switch Bracket Decal	1			
56 0810-600004	Screw Hex Head 1/4-20 x 3/4" Zinc	2			
57 0755-626530	#6 Wire - 100 Feet	1			
58 0755-626541	#6 Wire - 110 Feet	1			
59 0755-626542	#6 Wire - 120 Feet	1			
60 0755-626543	#6 Wire - 130 Feet	1			
61 0755-626544	#6 Wire - 140 Feet	1			
62 0755-626545	#6 Wire - 150 Feet	1			
63 0755-626546	#6 Wire - 160 Feet	1			
64 0755-626547	#6 Wire - 170 Feet	1			
65 0825-670551	Screw PH 1/4-20 x 3/4 Type F Zinc	12			
66 0850-603756	Metal Loop Clamp	12			
67 0930-861612	Wiring Diagram	1			

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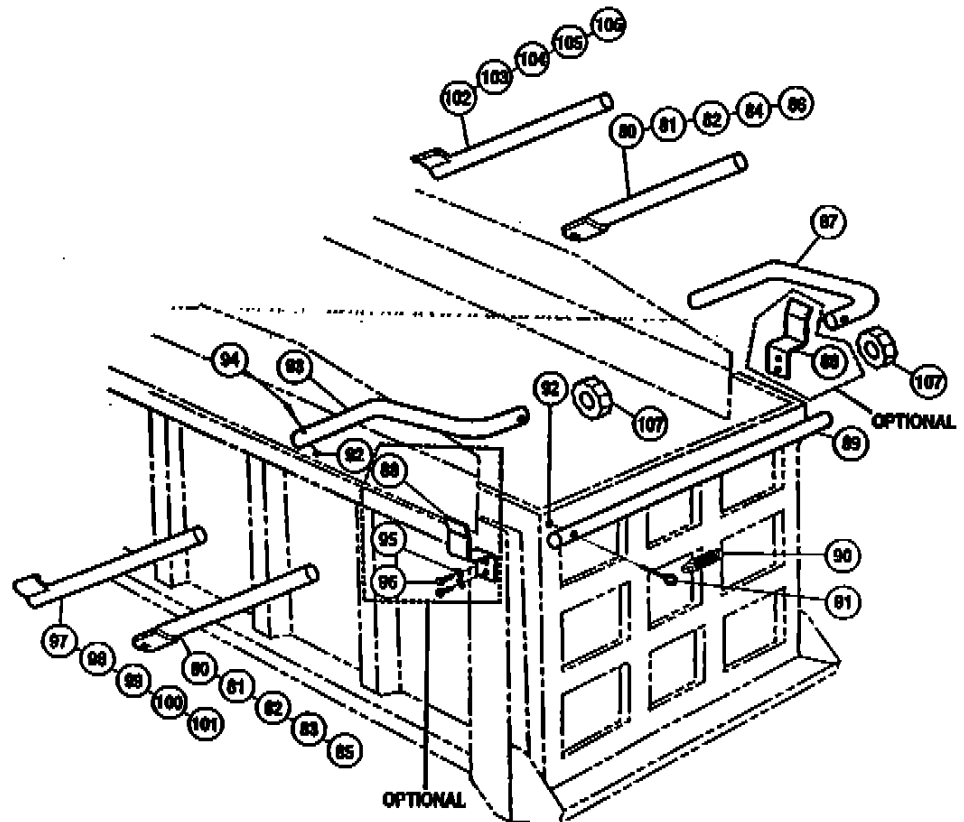
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Easy Cover® 500/550/575

Steel Swing Arms

No. Part No.	Description	Qty.	No. Part No.	Description	Qty.
80	0311-960280 Swing Arm Underside 10' - 13' D.S. or P.S.	1	97	0311-960288 Swing Arm Side Mount 10' - 13' D.S.	2
81	0311-960281 Swing Arm Underside 14' - 17' D.S. or P.S.	1	98	0311-960289 Swing Arm Side Mount 14' - 17' D.S.	1
82	0311-960282 Swing Arm Underside 18' - 21' D.S. or P.S.	1	99	0311-960290 Swing Arm Side Mount 18' - 21' D.S.	1
83	0311-960283 Swing Arm Underside 22' - 25' D.S.	1	100	0311-960291 Swing Arm Side Mount 22' - 25' D.S.	1
84	0311-960284 Swing Arm Underside 26' - 28' P.S.	1	101	0311-960292 Swing Arm Side Mount 26' - 28' D.S.	1
85	0311-960284 Swing Arm Underside 26' - 28' D.S.	1	102	0311-960294 Swing Arm Side Mount 10' - 13' P.S.	1
86	0311-960283 Swing Arm Underside 26' - 28' P.S.	1	103	0311-960295 Swing Arm Side Mount 14' - 17' P.S.	1
87	0311-860590 Connecting Arm P.S.	1	104	0311-960296 Swing Arm Side Mount 18' - 21' P.S.	1
88	0311-960249 Swing Arm Saddle	2	105	0311-960297 Swing Arm Side Mount 22' - 25' P.S.	1
89	0311-860591 Cross Arm Steel	1	106	0311-960298 Swing Arm Side Mount 26' - 28' P.S.	1
90	0715-619601 Spring Tension 4" Zinc	2	107	0311-862260 Arm Guard Rubber Bumpers (for Steel)	2
91	0810-670904 Bolt Eye 1/4"-20 x 2 1/2" Zinc	2			
92	0815-660450 Nut Keps 1/4"-20 Zinc	8			
93	0311-860589 Connecting Arm D.S.	1			
94	0810-670454 Bolt HHC 1/4"-20 x 2 1/2" Zinc	4			
95	0820-680520 Washer Split Lock 5/16" Zinc	9			
96	0810-660610 Bolt HWH 5/16" x 1" Type F Self Tapping Zinc	9			



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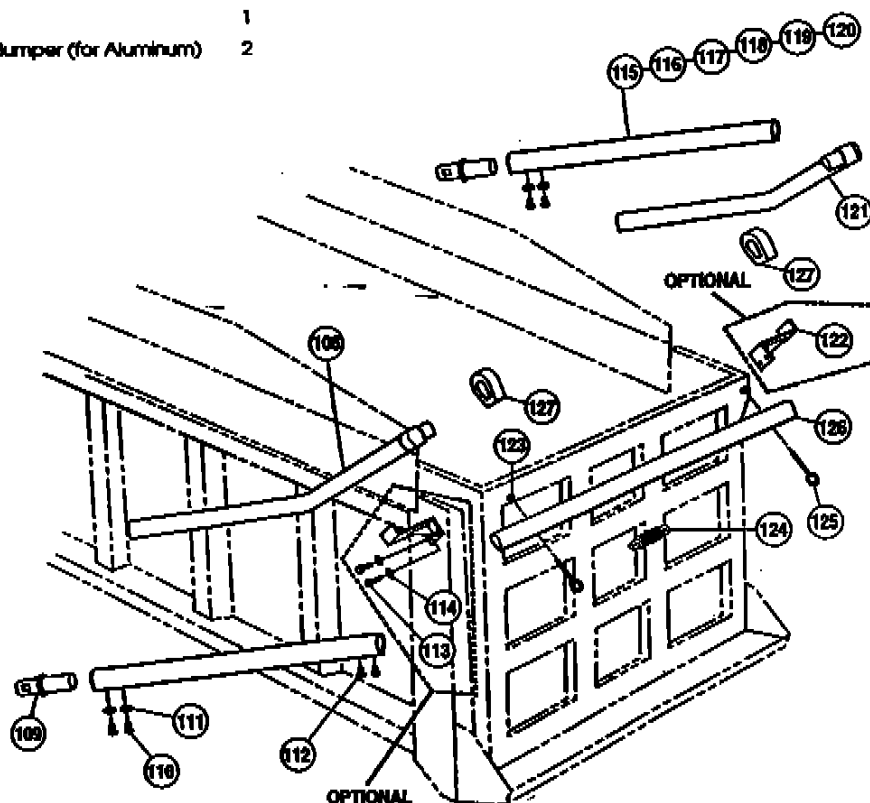
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Aluminum Swing Arms

No.	Part No.	Description	Qty.
108	0311-961200	Swing Arm Assy. Upper D.S. Short	1
109	0311-864100	Swing Arm Undermount End Fitting	2
110	0810-650101	Bolt HCS 5/16"-18x3/4	4
111	0820-680520	Washer Split Lock 5/16"	4
112	0810-650617	Bolt 3/8"-16x1 1/2" Grade 5 Zinc	4
113	0810-650510	Screw 5/16"x1" Self-Tapping	4
114	0820-680520	Washer Split Lock 5/16"	4
115	0311-861402	Swing Arm Lower 62"	2
116	0311-861413	Swing Arm Lower 88-5/8"	2
117	0311-861403	Swing Arm Lower 123"	2
118	0311-861414	Swing Arm Lower 150"	2
119	0311-861404	Swing Arm Lower 187"	2
120	0311-861416	Swing Arm Lower 215"	2
121	0311-961201	Swing Arm Assy. Upper P.S. Short	1
122	0311-960249	Swing Arm Saddle	2
123	0815-660450	Nut Keps 1/4"-20 Zinc	2
124	0715-619601	Spring Tension 4" Zinc	2
125	0810-670904	Bolt Eye 1/4"-20 x 2 1/2"	2
126	1360-148017	Cross Arm	1
127	0311-862268	Arm Guard Rubber Bumper (for Aluminum)	2



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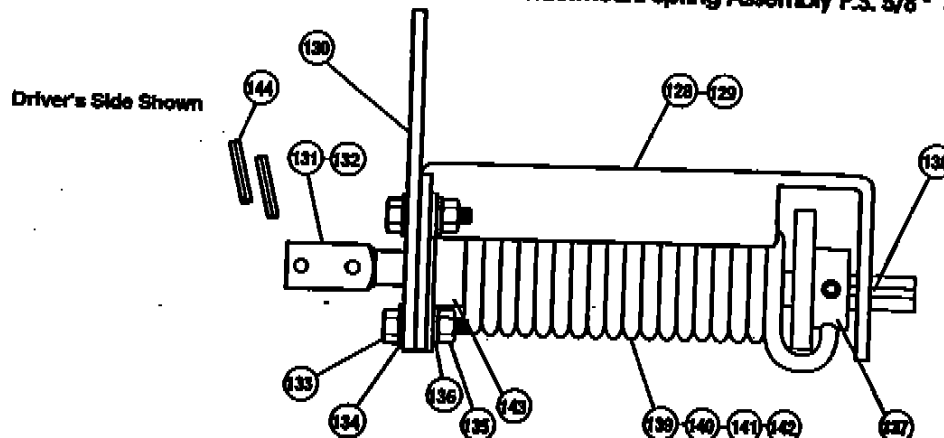
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Undermount Spring Assembly D.S. 1/2" #0311-960344
Undermount Spring Assembly D.S. 5/8" #0311-960346

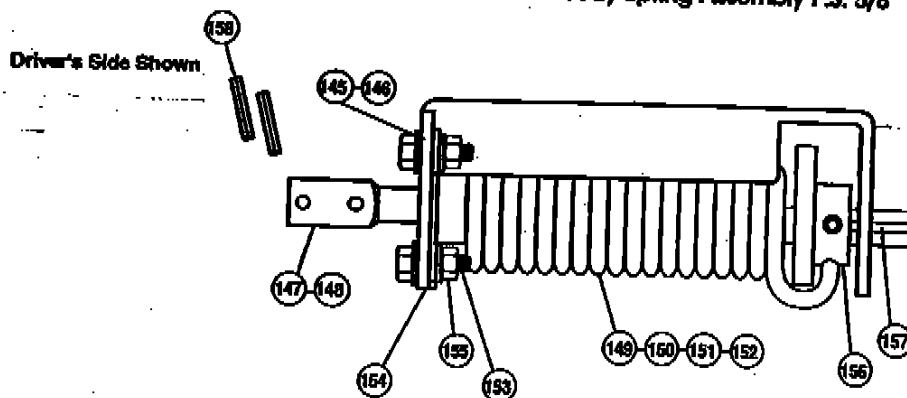
Undermount Spring Assembly P.S. 1/2" #0311-960345
Undermount Spring Assembly P.S. 5/8" #0311-960347



No.	Part No.	Description	Qty.	No.	Part No.	Description	Qty.
128	0311-960330	Spring Underbody Bracket 1/2"	2	136	0820-680510	Washer Flat 5/16" Zinc	4
129	0311-960350	Spring Underbody Bracket 5/8"	2	137	0311-960587	Bar Spring Grab Assy.	2
130	0311-860461	Mounting Plate Steel UM Spring	2	138	0840-618513	Keystock 6mm x 2 1/4"	2
135	0311-860451	Shaft Spring for 1/2" Spring	2	139	0715-619562	Spring Undermount D.S. 1/2"	1
132	0311-860452	Shaft Spring for 5/8" Spring	2	140	0715-619564	Spring Undermount P.S. 1/2"	1
133	0810-670650	Bolt HHCS 3/8"-16x1/2" Grade 2	8	141	0715-619565	Spring Undermount D.S. 5/8"	1
134	0820-680620	Washer Flat 3/8"	16	142	0715-619563	Spring Undermount P.S. 5/8"	1
135	0815-660660	Nut Hex 3/8-16	12	143	0710-602157	Bearing Two Flange 1" Bore	2
				144	0835-691700	Spring Pin	2

Underbody Spring Assembly D.S. 1/2" #0311-960340
Underbody Spring Assembly D.S. 5/8" #0311-960342

Underbody Spring Assembly P.S. 1/2" #0311-960341
Underbody Spring Assembly P.S. 5/8" #0311-960343

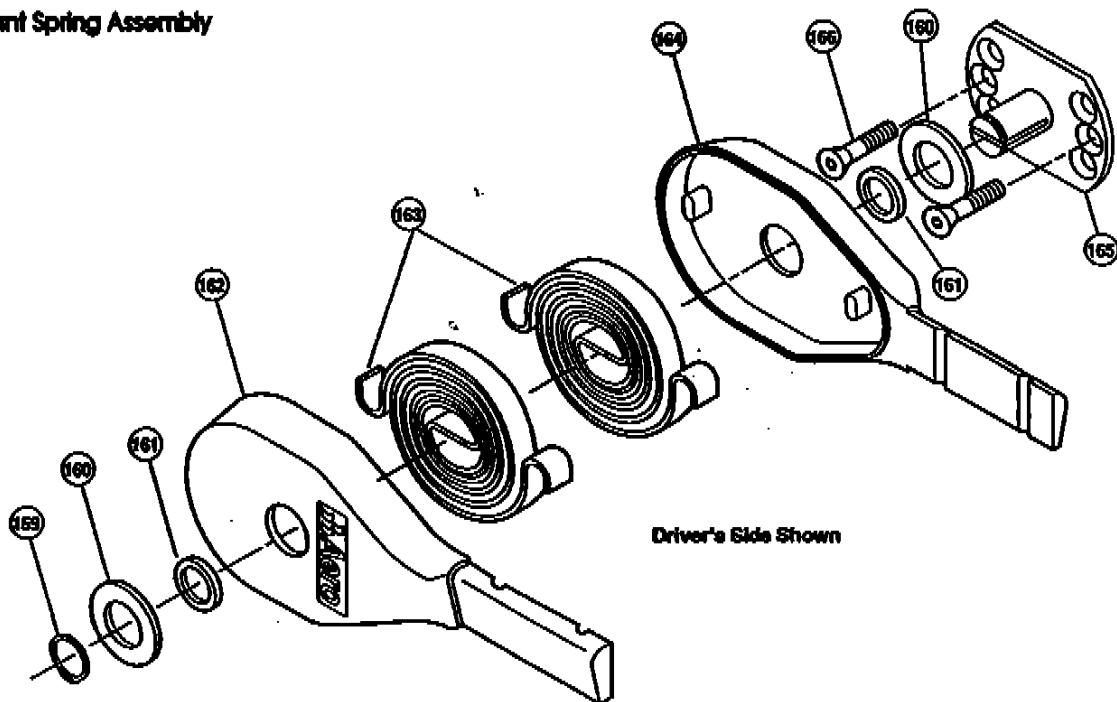


No.	Part No.	Description	Qty.	No.	Part No.	Description	Qty.
145	0311-860468	Spring Underbody Bracket 1/2"	2	152	0715-619563	Spring Undermount P.S. 5/8"	1
146	0311-860469	Spring Underbody Bracket 5/8"	2	153	0810-670650	Bolt HHCS 3/8"-16x1/2" Grade 2	4
147	0311-860451	Shaft Spring for 1/2" Spring	2	154	0820-680510	Washer Flat 5/16" Zinc	4
148	0311-860452	Shaft Spring for 5/8" Spring	2	155	0815-660660	Nut Hex 3/8-16	4
149	0715-619562	Spring Undermount D.S. 1/2"	1	156	0311-960587	Bar Spring Grab Assy.	2
150	0715-619564	Spring Undermount P.S. 1/2"	1	157	0840-618513	Keystock 6mm x 2 1/4"	2
151	0715-619565	Spring Undermount D.S. 5/8"	1	158	0835-691700	Spring Pin	2

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Sidemount Spring Assembly



No.	Part No.	Description	Qty.
159	0311-860902	External Retaining Ring 1 1/4"	2
160	0820-680411	Washer, Steel 1 1/4"	4
161	0311-860231	Bushing, Plastic	4
162	0311-860910	Casting, Sidemount V2.0 Male Economy	2
163	0715-619450	Spring, Sidemount Double Torsion	4
164	0311-860911	Casting, Sidemount V2.0 Female Economy	2
165	0311-860909	Mounting Bracket Assembly	2
166	0825-660852	Screw, Flathead, 1/2-13 x 1 3/4	4

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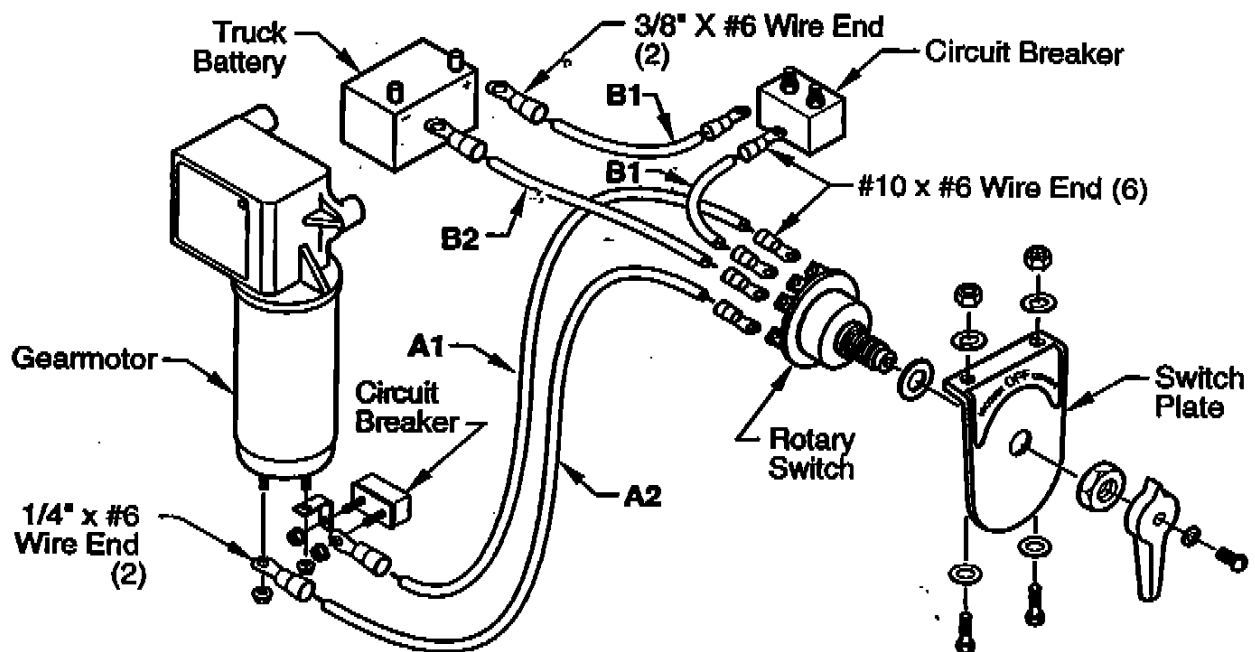
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Wiring Instructions for the PowerPlus Motor



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