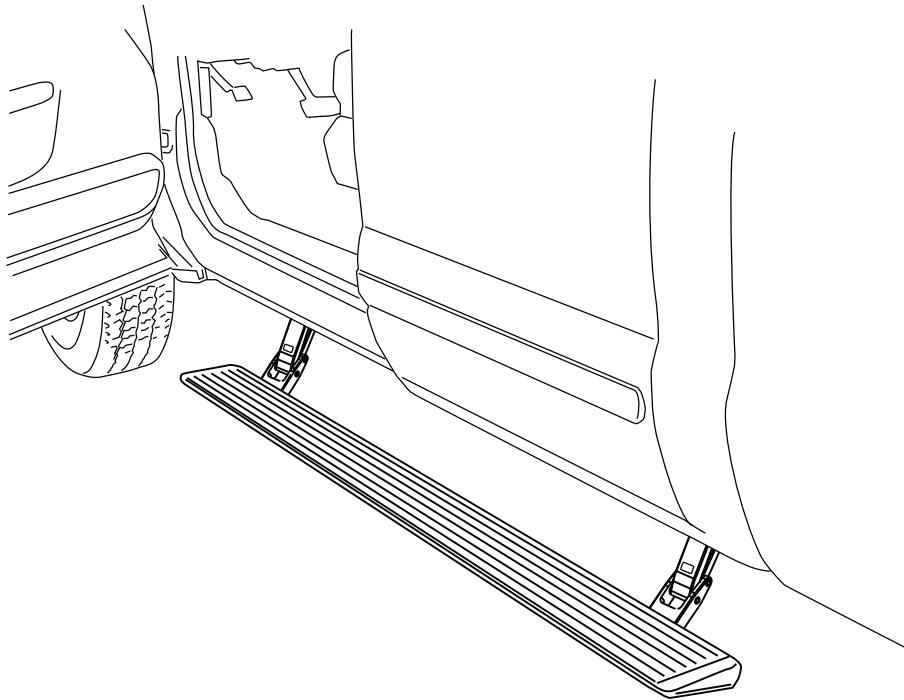


INSTALLATION GUIDE

AMP RESEARCH Power Step

Nationally Distributed by Bestop

APPLICATION	LENGTH	MODEL YR	PART #
Ford F-150 Supercrew		2001-2003 (2004 Heritage)	10-02996-13



INSTALLATION TIME



3:00 hrs

SKILL LEVEL



4= Experienced

TOOLS REQUIRED

- Safety goggles
- Measuring tape
- Flat blade screwdriver
- Phillips head screwdriver
- Right angle drill
- 1/8" drill bit
- 21/64" drill bit
- 13mm socket
- 10 mm socket
- 8 mm socket
- Ratchet wrench and extension
- 13mm end wrench
- Wire crimpers
- Wire stripper / cutter
- Vise grip pliers
- Corrosion inhibitor
- 3/16" hex key wrench (allen wrench)
- 5mm hex key wrench (allen wrench)
- 4mm hex key wrench (allen wrench)
- Electrical tape
- Weather proof caulking (silicone sealer)

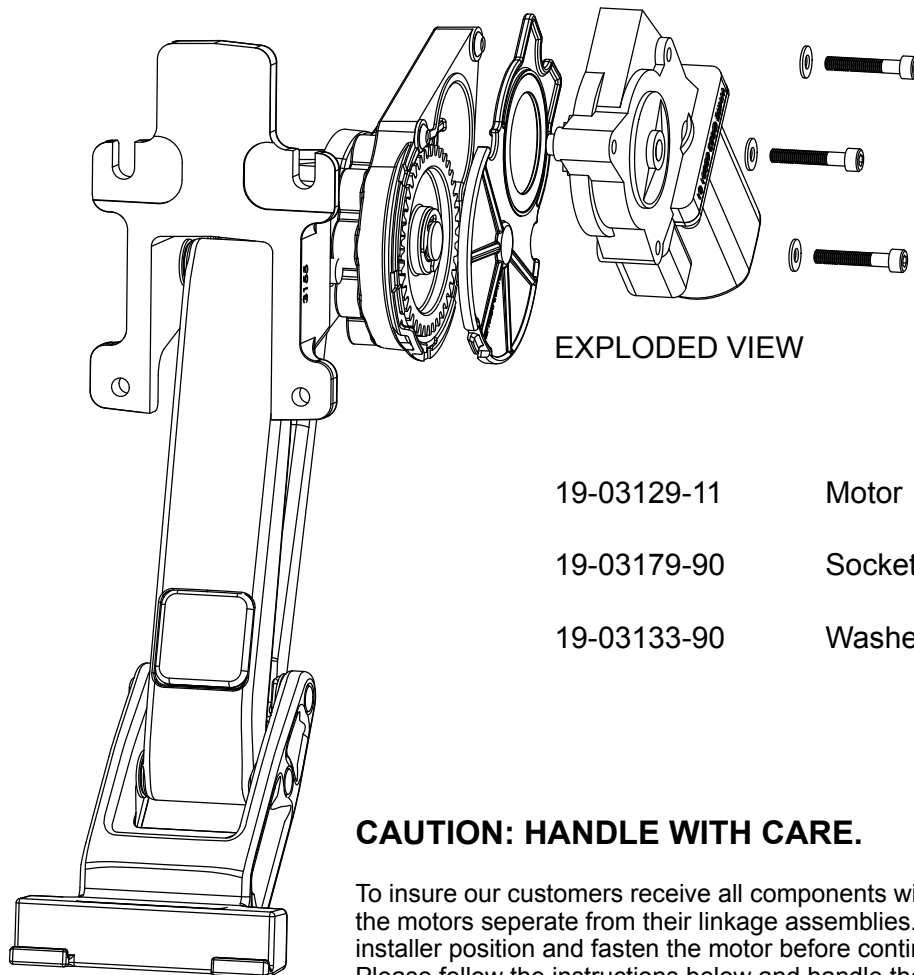
TECH SUPPORT 1-888-983-2206 (Press 5 for Customer Service) Monday - Friday, 8:00 AM - 5:00 PM PST

Designed and manufactured by AMP Research. Patent 6,830,257 / 6,641,158 / 6,834,875 / 6,938,909 / 6,942,233 / 7,007,961 Other US and worldwide patents pending. Three-year limited warranty. Professional installation is recommended. Nationally Distributed by Bestop.

INSTALLATION GUIDE

Attaching motor to linkage assembly

The motors need to be installed before continuing with the rest of the Power Step install.



19-03129-11	Motor
19-03179-90	Socket cap screw
19-03133-90	Washer

CAUTION: HANDLE WITH CARE.

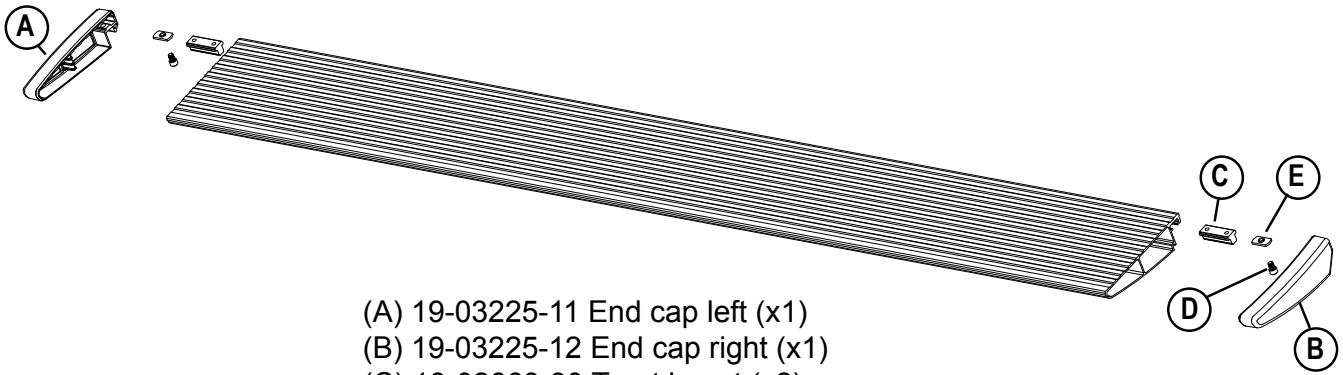
To insure our customers receive all components with full integrity, we pack the motors separate from their linkage assemblies. This requires that the installer position and fasten the motor before continuing with the install. Please follow the instructions below and handle the assembly carefully.

CAUTION: Dropping the assembly or any excessive impact MAY cause damage to the motor.

Instructions:

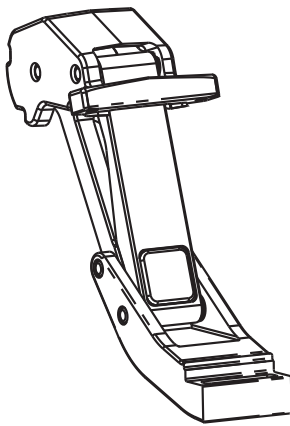
1. Position the gear cover in place as shown if not already in place.
2. Seat motor into position on the three mounting bosses. This may require an adjustment of the gear by moving the swing arms.
3. After seating into place, fasten the motor with the three motor mount screws with T30 Torx. Tighten screws to 80 in-lbs (9N-m). Do not over torque.

77

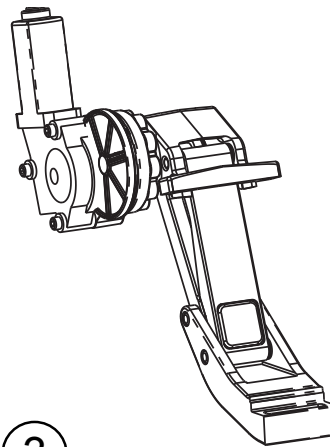


- (A) 19-03225-11 End cap left (x1)
- (B) 19-03225-12 End cap right (x1)
- (C) 19-02663-90 T-nut insert (x2)
- (D) 19-03236-90 Socket cap screw (x2)
- (E) 19-03237-90 Nut plate (x2)

1 x2
 20-03314-72
 Step assembly

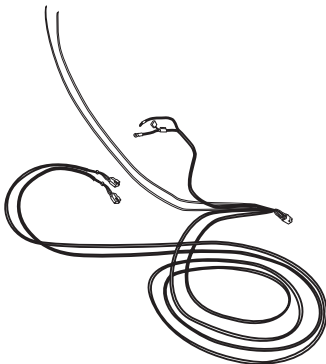


2 x2
 10-03058-11
 Idler linkage assembly

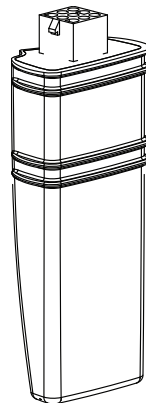


3 x2
 10-03059-12
 Motor linkage assembly

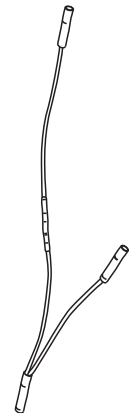
NOTE: The motor is shipped separated from upper mount for part protection. Preassembly required. See page 2.



4
 19-02726-91
 Wire harness

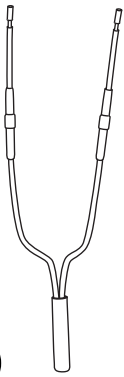


5
 19-03297-93
 Controller

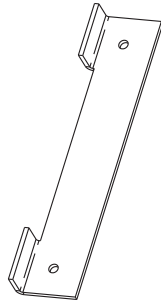


6 x4
 19-02727-90
 Single-diode

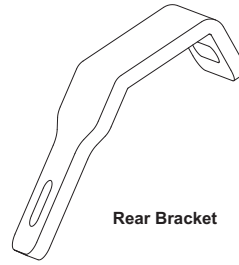
PARTS LIST AND HARDWARE IDENTIFICATION



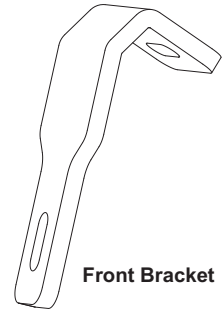
7
19-02890-90
Double Diode



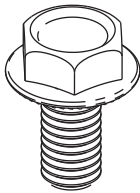
8
19-03044-90
Drill Template



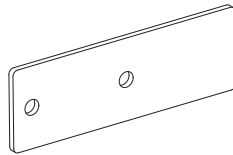
9 x2
16-03166-90
Rear Bracket



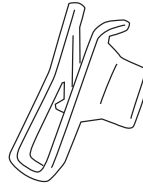
10 x2
16-03165-90
Front Bracket



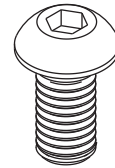
11 x4
19-03037-90
Hex Flange Bolt



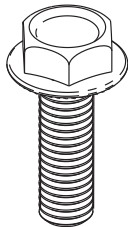
12 x2
16-03171-90
Support Bracket



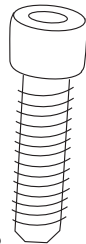
13 x6
19-02488-90
Nut U-Style



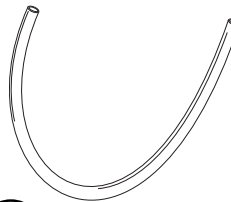
14 x8
16-02634-90
Button Head Bolt



15 x6
19-02740-90
Hex Flange Bolt

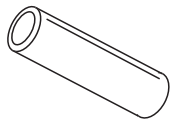


16 x8
19-02802-90
Socket Cap Screw

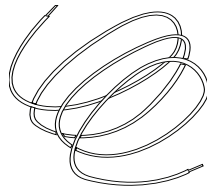


17
19-02992-90
Tubing
(Installation Tool)

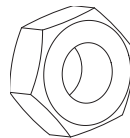
18 x25
19-02805-90
Cable Ties 7"



20 x2
19-02989-90
Bull Connector



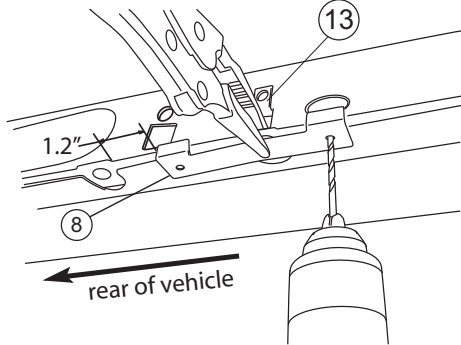
21 x2
19-02986-90
Connecting Wire Red



22 x8
19-03021-90
Hex Nut

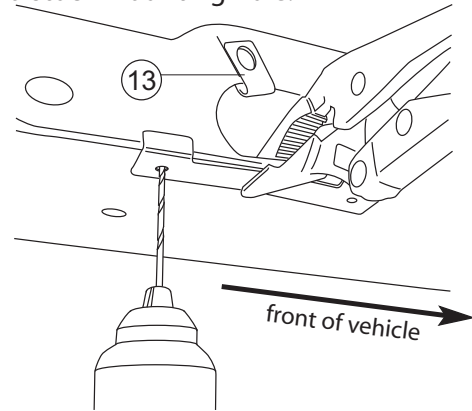
19 x2
19-03339-90
Cable Ties 11"

Install U-Nut. Drilling Rear Mounting Holes: Position and clamp drill template as shown, (center on U-Nut) and pilot drill mount holes with 1/8" drill bit. Remove template and drill holes to 21/64".



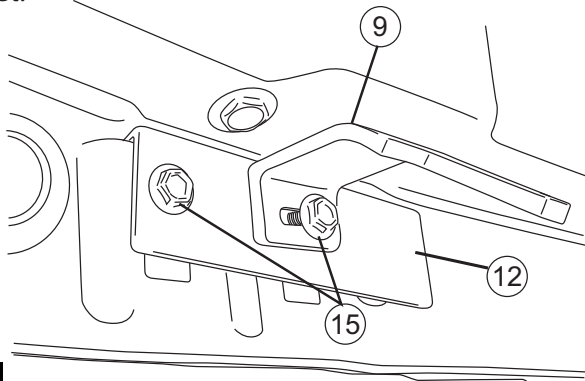
1 Note: Steps 1-9 show Driver's Side.

Install U-Nut. Drilling Forward Mounting Holes: Position and clamp drill template as shown, (center on U-Nut) centering the template around stock mounting hole.



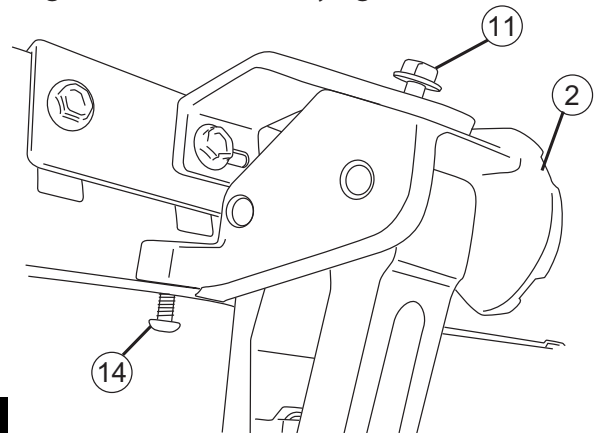
2

Mounting Rear Brackets: Install two u-nuts if not already present. Install support bracket and then install Rear Bracket. Do not tighten bolts yet.



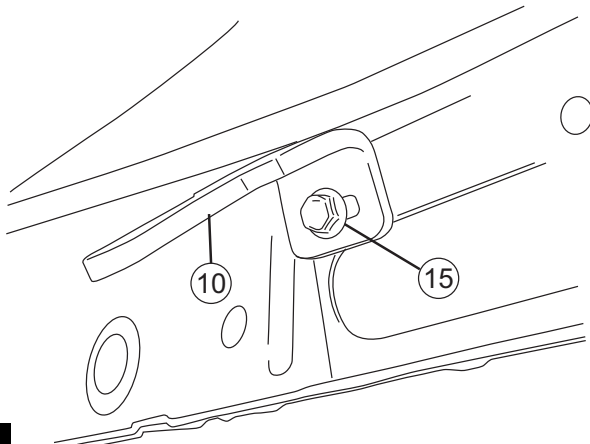
3

Position Idler Mount at rear mount location and bolt to bracket and drilled mounting holes. Snug all bolts... do not fully tighten.



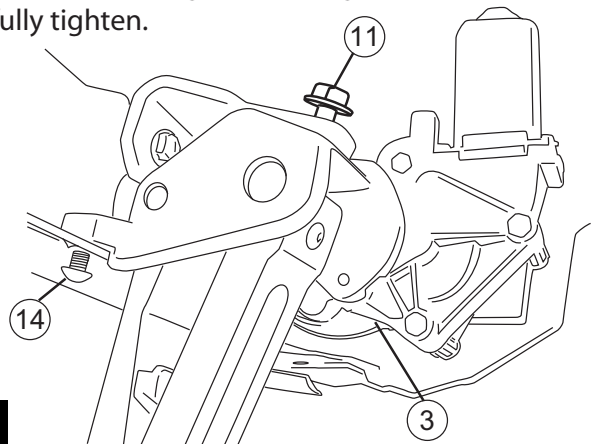
4

Mount Front Bracket to upper stock mounting hole that the drill template was centered about.



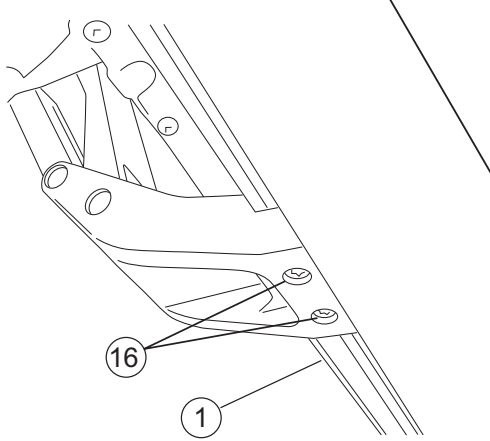
5

Position motor linkage assembly in forward mounting position and bolt to bracket and drilled mounting holes. Snug all bolts... do not fully tighten.



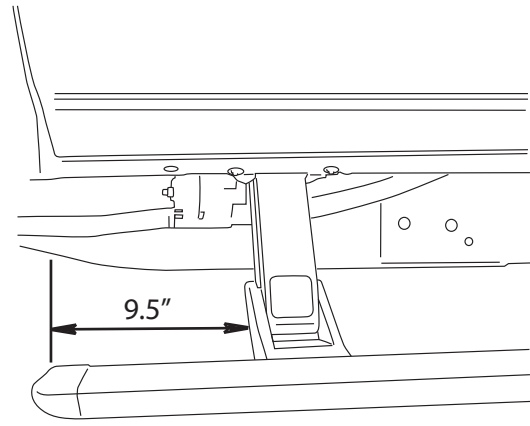
6

Line up T-nuts of step extrusion and insert 1/4-20 bolts. You may need to use the end of the Allen wrench to align the holes with the T-nut.



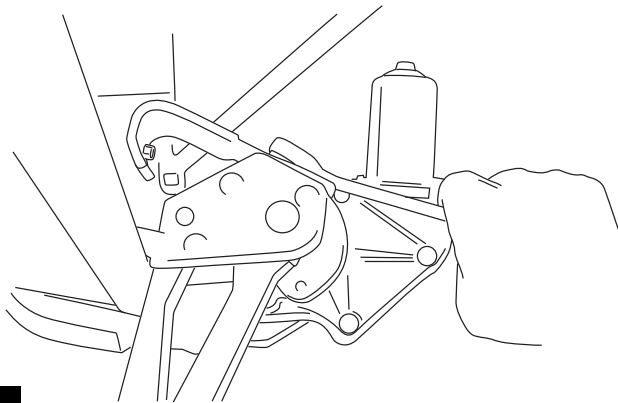
7

The rearward edge of the board should be about 9.5in from rear mount. Tighten 1/4-20 bolts to 10 ft-lbs.



8

Tighten all bolts of steps 3-6 to 16 ft-lbs.

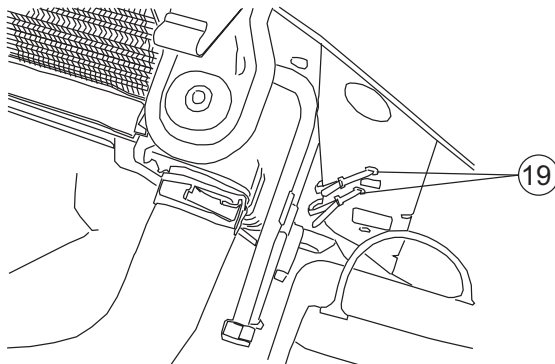


9

Repeat steps 1-9 for the passenger side.

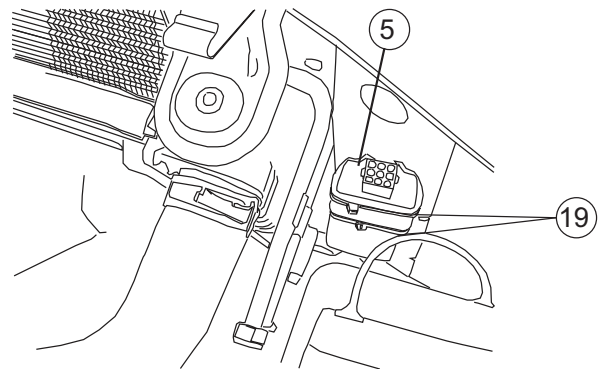
10

Mounting Controller: Under the hood in front of the wiper fluid reservoir loop the two 11" zip ties through the holes on radiator support sheet metal. Start zip ties, leaving enough to insert controller.



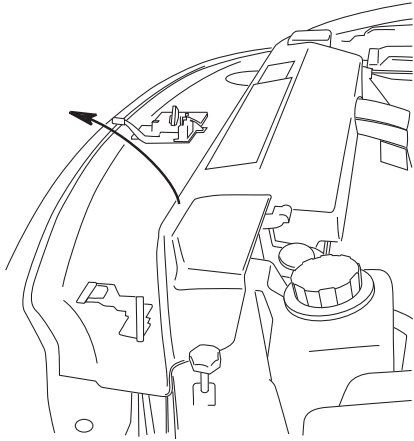
11

Insert controller through loose zip ties, align zip ties into grooves in controller and tighten. Plug in harness making sure tabs engage completely on controller.



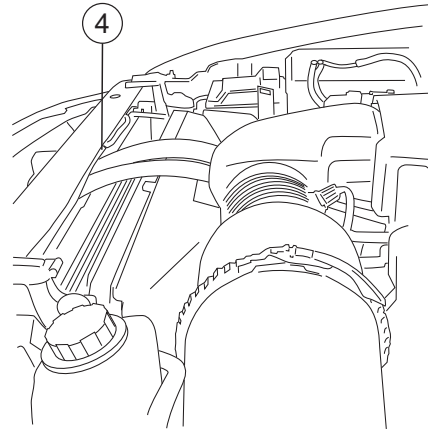
12

Remove the front radiator shroud to access clear routing for Power Step wire harness.



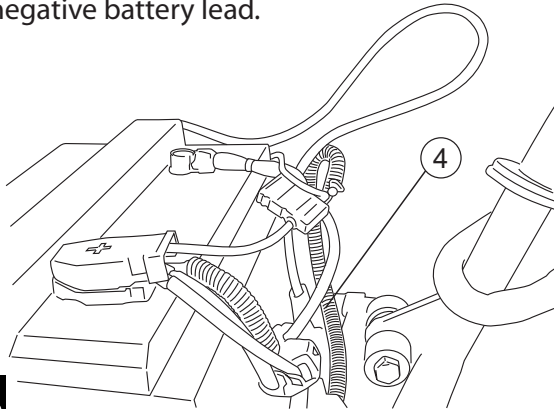
13

Route the long harness end and power hook-up end of Power Step wire harness along front edge and secure with tie wraps along the way.



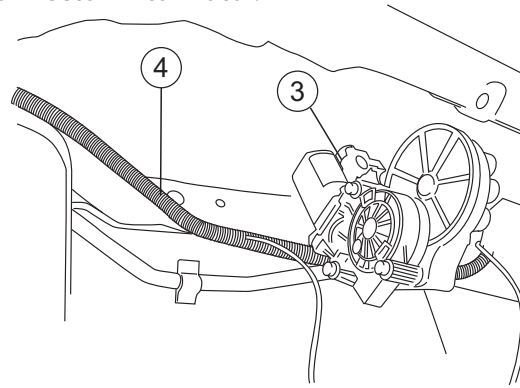
14

After removing Power Step harness fuse, attach ring terminal of the red wire to the positive battery lead and that of the black wire to the negative battery lead.



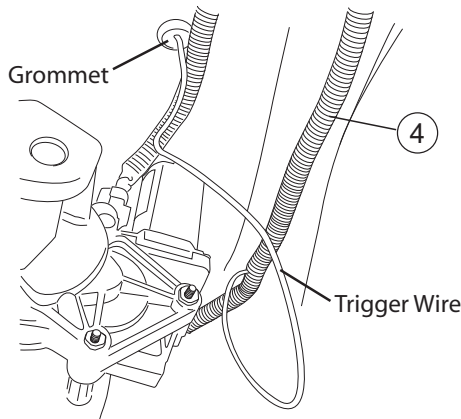
15

Route harness end with motor connectors down the inner side walls of truck and down along the frame to the motorized linkages. Plug connector into motor.



16

Pierce holes in front floor board grommets to allow access for harness trigger wire into cab of vehicle. Push purple trigger wires through pierced holes.



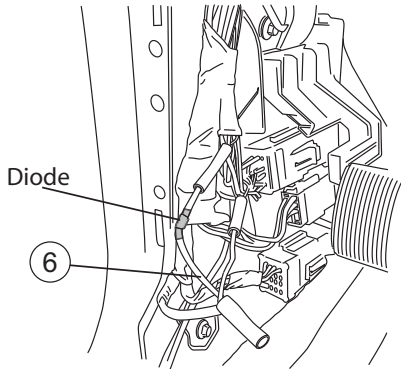
17

After pushing/pulling wire slack through grommet, apply some silicon sealer to hole in grommet.

Secure any loose wires with tie wraps and/or electrical tape.

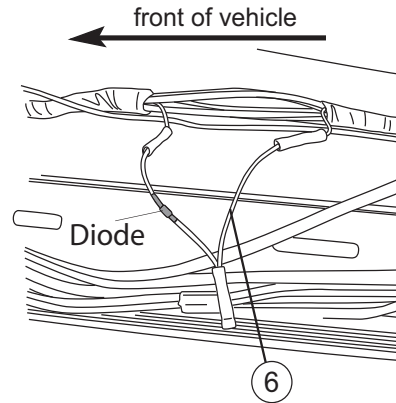
18

Remove driver side step plate and kick panel. Of the three connectors to the left of the parking brake pedal, locate the top connector. Splice single diode harness into Black with Yellow stripe wire, diode end away from connector as shown in figure.



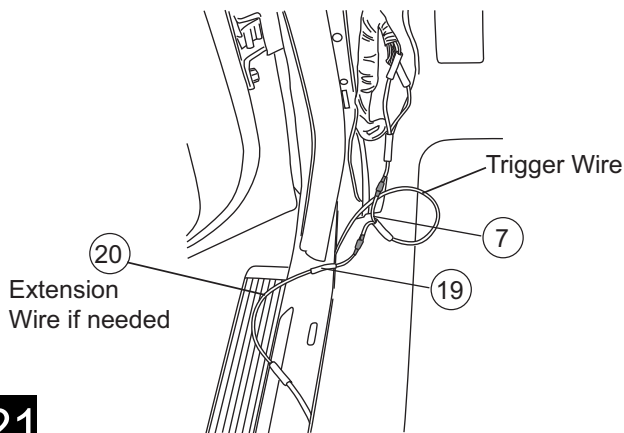
19

Locate harness bundle under driver sill plate, open bundle and find Black with Light Blue stripe wire. Splice into wire single diode harness with the diode end toward the front of the vehicle.



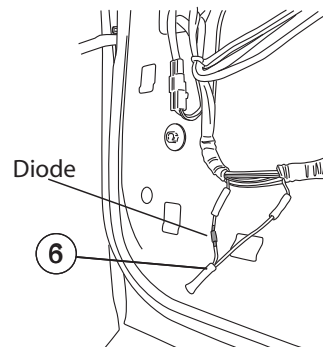
20

Connect Double Diode Harness to purple trigger wire and extend each end to the blue butt connectors of steps 19 and 20.



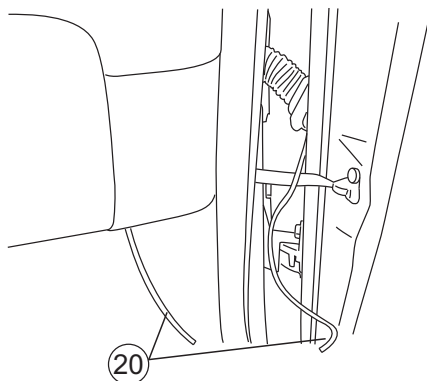
21

On the Passenger side remove front door paneling and locate wire bundle running out toward the door latch as shown. Connect Single Diode Harness to Black with Pink stripe wire with diode end heading back toward the vehicle cabin.



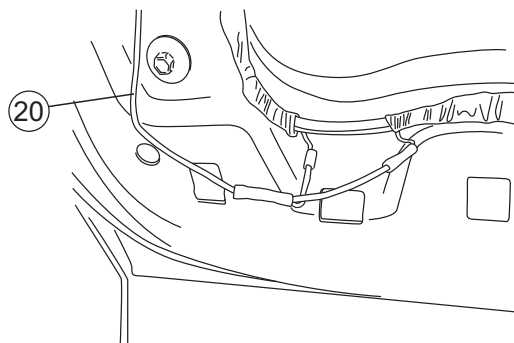
22

Pass supplied red connecting wire from door to cabin through the door hinge wire accordion. You may want to use the supplied plastic tubing to help pass the wire through.



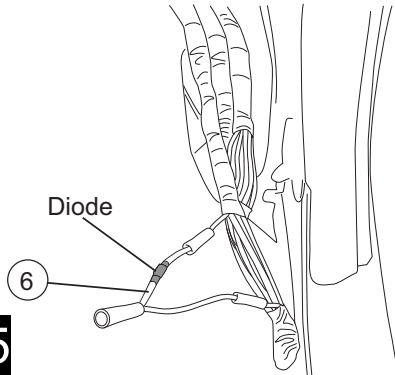
23

Connect door end of red connecting wire to the blue butt connector of step 22. Secure any loose wires with tie wraps and/or electrical tape.



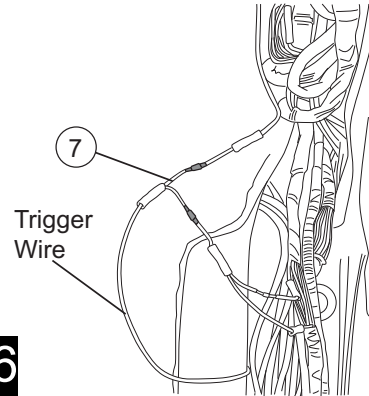
24

Under passenger front kick panel locate bundle that comes from the rear of the vehicle. Open the bundle and locate the Black with White stripe wire and splice in Single Diode Harness with the diode end toward the front of the vehicle.



25

Connect purple trigger wire to Double Diode Harness. Connect one open end of the harness to the red connecting wire from the door and the other end to the blue butt connector of step 25.

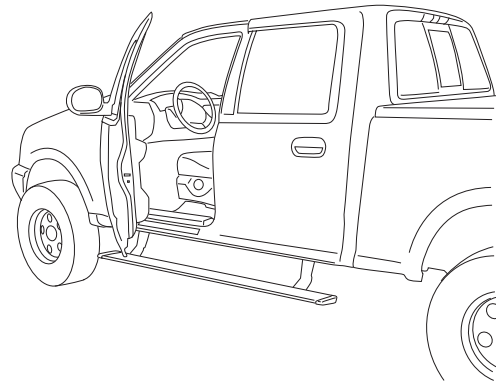


26

Secure all loose wires with tie wraps and/or electrical tape.

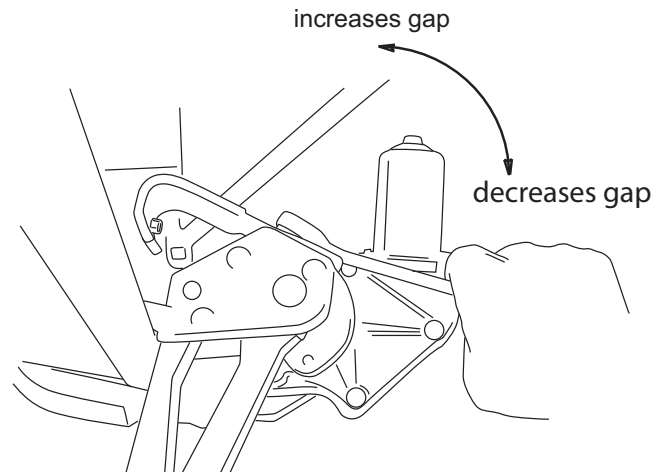
27

Reinstall the fuse that was removed in step 15 and check for proper functioning of the step. Check for even stow position of board.



28

Slight adjustments to the upper mount can be made to adjust stow position. With the board extended, loosen hex bolt as shown, adjust as needed, and retighten hex bolt to 16 ft-lbs. The adjustments will be made to either increase or decrease the gap between the board and rocker panel when stowed.



29

LIMITED WARRANTY

AMP RESEARCH warrants product to be free from defects in material and workmanship, for terms specified below, provided there has been normal use and proper maintenance. This warranty applies to the original purchaser only. All remedies under this warranty are limited to the repair or replacement of any item found by the factory to be defective within the time period specified.

If you have a warranty claim, first you must call our factory at the number below for instructions. You must retain proof of purchase and submit a copy with any items returned for warranty work. Upon completion of warranty work, if any, we will return the repaired or replaced item or items to you freight prepaid. Damage to our products caused by accidents, fire, vandalism, negligence, misinstallation, misuse, Acts of God, or by defective parts not manufactured by us, is not covered under this warranty.

THE WARRANTY TIME PERIOD IS AS FOLLOWS: THREE YEARS FROM DATE OF PURCHASE.

ANY IMPLIED WARRANTIES OF MERCHANTABILITY AND/OR FITNESS FOR A PARTICULAR PURPOSE CREATED HEREBY ARE LIMITED IN DURATION TO THE SAME DURATION AND SCOPE AS THE EXPRESS WRITTEN WARRANTY. OUT COMPANY SHALL NOT BE LIABLE FOR ANY INCIDENTAL OR CONSEQUENTIAL DAMAGE.

Some states do not allow limitations on how long an implied warranty lasts, or the exclusion or limitation of incidental or consequential damages, so the above limitations or exclusions may not apply to you.

This warranty gives you specific legal rights, and you may also have other rights that vary from state to state.

For further information or request for warranty work, please call toll-free 1-888-983-2206 (press 5) for Customer Service.

WARNING

The manufacturer strongly recommends that this product be professionally installed.

Failure to carefully follow the electrical installation steps could result in severe electrical shock that could harm the installer and/or damage the vehicle.

This product is designed to enhance the appearance of the vehicle. Do not rely in any way on the components of this product to contain occupants within the vehicle, or to protect against injury or death in the event of an accident. Never operate vehicle in excess of manufacturer's specifications.

WEAR SEAT BELTS AT ALL TIMES

Read and follow, precisely, all installation instructions provided when installing this product. Failure to do so could place occupants of the vehicle in a potentially dangerous situation. After installing or reinstalling, check to make sure it has been properly installed.