

# (23-On) Ford Super Duty 7XL Linkable Kit (44-8229 & 44-8229-UP)



2950 Norman Strasse San Marcos, CA 92069

Phone 760-560-2252 X3 • Fax 760-560-0383

info@bajadesigns.com • www.bajadesigns.com



## LIMITED LIFETIME WARRANTY

Baja Designs proudly offers a LIFETIME WARRANTY against manufacturer's defect on all the products that we manufacture.

These are comprehensive warranties; other than the exclusions below – you're covered. If your LED or HID bulb burns out, you're covered. Additionally, cutting off our connector or changing your lenses does not automatically void your warranty.

#### **Exclusions:**

Installation errors, abuse, misuse, or crash damage. You must be the original owner of the product and can supply proof of purchase.

Baja Designs manufactures its own products as well as resells products manufactured by others. Baja Designs makes no express or implied warranties on products not manufactured by Baja Designs including without limitation any warranties or merchantability and fitness for a purpose. We will, however, pass on all warranties made by the manufacturer, who has sole responsibility for performing such warranties. Baja Designs will pay the freight if your product is less than 90 days old, otherwise defective products must be returned to Baja Designs, Inc., freight prepaid. At our option, we will repair or replace items in question and return them at no charge. If the identical product is no longer available, we will replace it with a similar product of equal value. Baja Designs Inc. will not be responsible for any indirect or consequential damages in connection with defective merchandise.

Items purchased through a Baja Designs authorized dealer must be returned through the dealer. Only available on LED auxiliary lights and product must be in sellable condition at MSRP. Product that has been damaged in any way after the original purchase date will be excluded from this guarantee.

#### Indemnification:

Buyer hereby acknowledges off-roading, racing and driving at night are dangerous activities and that the products and/or supplies purchased from Baja Designs are used in an inherently dangerous activity that may endanger life and limb; and in no event shall the seller, or seller's heirs and assigns, be held liable for consequential damages, nor shall seller's liability on any claim for damages arising out of or connected with the sale, delivery, or use of purchased products and/or supplies exceed the purchase price of the products and/or supplies.

Buyer is responsible for ensuring that it uses the products (and its vehicle) in accordance with all applicable laws, regulations, guidelines, and standards of care. Buyer acknowledges that some products may only be used when off-roading, and Buyer will comply with all vehicle and road safety guidelines. Buyer is solely responsible for (and will indemnify and hold Bestop harmless for) any claims, losses, damages, fines, fees, costs, or other amounts arising out of Buyer's non-compliance with these provisions.

### Required Tool(s):

• 7, 10, 15, 18, 7/16" Sockets

• 3/16" 5/32", Size 6, Hex bits

• 13, 7/16", Wrenches

• T20 Torx

Pick Pliers

Flush cutter

Trim Removal Tool

#### **Parts List:**



XL Linkable 7XL Clear w/o Pre-load and Harness (74-9005) (Qty:1)



Upfitter Wiring Harness, OnX6/S8/XL (Upfitter Version Only) (64-0094) (Qty:1)



Ford, Super Duty (23-On), Bumper Linkable Bracket DS (44-9432) (QTY:1)



Ford, Super Duty (23-On), Bumper Linkable Bracket PS (44-9433) (QTY:1)



OnX6+/S8 (10"-30") Off/On Harness (Toggle Version Only) (64-0115) (QTY: 1)



Hardware, M8 x 25mm Socket Cap Screw SS (20-1236) (QTY:4)

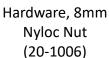


Hardware, 8mm Flat Washer (20-1022) (QTY:8)

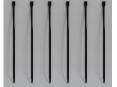








(QTY:4)



Hardware, Zip Tie 50lb 8" (20-1612) (QTY:6)



XL Linkable, Pre-Load Base Extension (44-9198) (QTY:1)



XL Linkable, Pre-Load Rubber Bump (44-9199) (QTY:1)



Hardware,1/4-20 X 7/8 Hex Head Bolt SS (20-1287) (QTY:2)



Hardware,1/4-20 X 1" Hex Head Bolt SS (20-1284) (QTY:1)



Hardware, M6 x 18mm Steel Washer (Zinc Plated) (20-1026) (QTY:2)



Hardware,1/4-20 Hex Nyloc nut SS (20-1286) (QTY:3)



(QTY:4)



Hardware, 0.070" Thick Sticky Back EPDM (64-0156) (QTY:10)



XL Linkable, Pre-Load Base Short (44-9431) (QTY:1)



Hardware, 1/4"-20 1" Flat Socket CS SS w/patchwax 5/32 drive (20-1253) (QTY:6)

# To begin, make sure the vehicle is in park, on level ground and the parking brake is engaged.

## **XL Linkable Preparation**

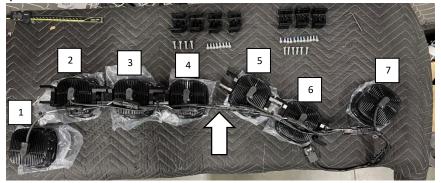
**Step 1:** Remove the 4X Links from each end using a 3/16" hex Bit for the socket head screws and a 5/32" hex Bit for the flat head screws.



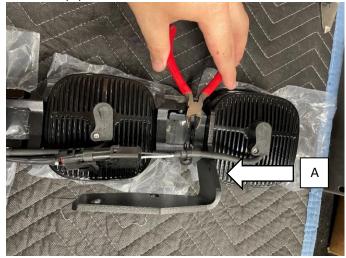
**Step 2:** Remove 2X links from the inside edge of the outermost lights using a 3/16" hex bit for the socket head screws and a 5/32" hex bit for the flat head screws (None of these flatheads will be reused).



**Step 3:** Split the linkable in between the  $4^{th}$  and  $5^{th}$  light. Remove the link on the  $4^{th}$  light using a 3/16" & 5/32" hex bit.

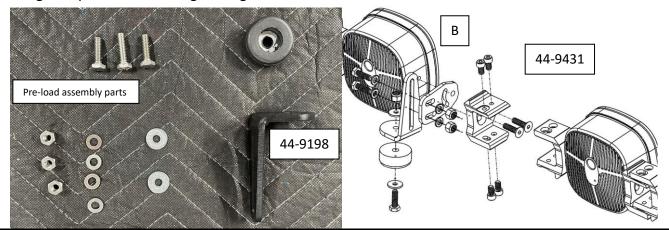


**Step 4:** Install the brackets (44-9432 & 44-9433) provided onto the inside of the outermost lights using the longer provided flathead screw. Use a 5/32" hex bit. The bracket's legs should face inward. Cut the zip ties on the last links as shown. Use zip ties to re-attach the loose harness to the zip tie locations on the mounting brackets (A) for better strain relief.

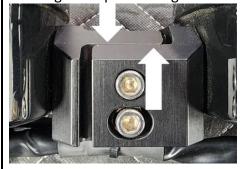


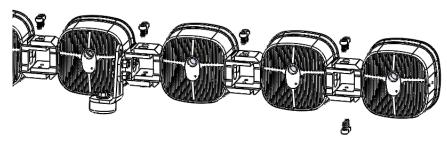
Note: Passenger side shown above

**Step 5:** Install the provided flat bracket (44-9431) (B) on the face of the 4<sup>th</sup> light and re-attach the link using the 2X flat head screws (20-1253) provided. Re-connect the two halves of the linkable using the four socket head screws removed in step 3. Install the pre-load base extension (44-9198) and hardware onto the flat bracket (44-9431) as shown below using a 7/16" Socket and wrench. Tuck the Rubber bumper as close to the light as possible before tightening. Leave loose for now.



**Step 6:** Loosen all socket head bolts on one side of the linkable using a 3/16" hex. Go to the opposite side of the linkable and loosen the 2X socket head bolts holding a set of links together. Align the links such that the two edges are parallel. Tighten the 4 X socket heads between those two links. Repeat this for all sets of links.





Step 7: The Linkable should look like the photo below.



**Step 8:** Cut the provided EPDM strip (64-0156) into 2.5" sections and apply two to each mount as shown below. Line up the straight edges and trim the excess as shown.



**Step 9:** With a 10mm socket, disconnect the negative battery cable from both batteries (boxed) (some vehicles may have only one battery). Ensure the cables can not touch the negative terminal.

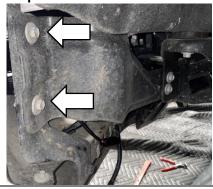




**Step 10:** Disconnect the OEM plug located on the Driver side frame rail next to the bumper. This will allow the bumper to be removed.



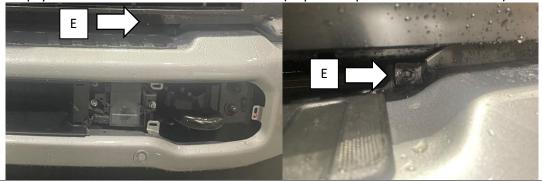
**Step 11:** Remove the 2X bolts connecting the bumper to the bumper support using a 15mm socket.



**Step 12:** Remove the plastic trim from around the tow hooks by pulling firmly from the tow hook opening and slipping a flat tool in the gaps indicated to separate the overlapping trim panels. (Both sides)

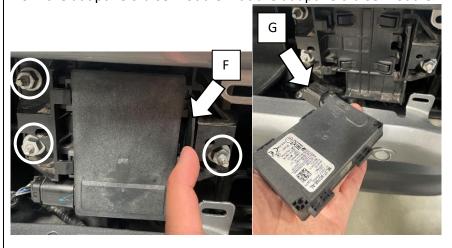


**Step 13:** Free the rubber trim from the OEM fastener (E) by using a trim removal tool to loosen the fastener and pry the rubber trim out from behind it. (Repeat steps 11-13 on both sides)



# Step 14: (Only applicable for models equipped with Adaptive cruise control)

Pull the securing tab (F) to the right and remove the adaptive cruise module. Disconnect the connector (G) from the adaptive cruise module. Put the adaptive cruise module in a **VERY** safe place.



**Step 15:** Loosen the 3X nuts (circled above) using a 7mm socket. Pull the plastic bracket straight out firmly to release it from the 3X studs.



**Step 16:** Loosen all 8X bolts from the front bumper mounts using an 18mm socket. Remove the bumper and place it on a flat/soft surface.



**Step 17:** Remove the plastic trim panel on top of the bumper. Use pliers to squeeze the clips from the inside and push them out. Remove any clips tying the panel to the harness. Cut the trim panel at the lines indicated.



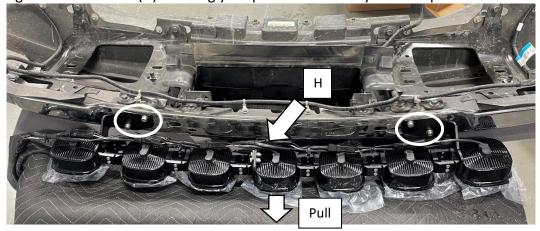
**Step 18:** Loosely install your pre-assembled XL Linkable from Step 8. Install 4X M8 Socket head screws, 4X M8 nyloc nuts and 8X M8 Washers using a 13mm wrench and a size 6 Hex bit.



**Step 19:** Loosely mock-up your large trim panel underneath the XL linkable. Note how much more material needs to be trimmed from the sides to fit around the mounting brackets. Trim the panel to fit (Should look roughly as pictured below). Lift the loose pre-load assembly and install your trim piece underneath.



**Step 20:** Tighten the mounting bolts for your XL Linkable. Manually lift your XL Linkable from the center and tighten the 2X bolts (H) securing your pre-load assembly from Step 5.



**Step 21:** Loosely re-install the bumper onto the OEM frame horns. Using an 18mm socket and the hardware removed in step 16.



**Step 22:** Tuck the linkable connector lead away into the bumper and make sure it drops down behind the passenger side fog light.



**Step 23:** Make sure no harnesses are being pinched. Make sure your bumper is level then fully tighten down the bumper. Reinstall all trim panels and bolts removed from steps 10-17. Make sure the OEM electrical connectors are reinstalled and the adaptive cruise bracket is reconnected.

**Step 24:** 

Run the 3-pin side of the wire harness down behind the passenger side headlight.

Note: The photo on the right depicts where the harness will exit the vehicle. (Bumper removed for visibility).



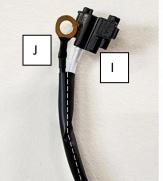
**Upfitter Only** Locate and detach the upfitter fuse box located near the PS fuse box (boxed) by pressing in the two locking tabs (1&2) and lifting up to access the bundle of wires underneath it. Take the included upfitter wiring harness and attach the white wire scotchlok (I) to the desired auxiliary wire using a set of pliers. Reinstall the upfitter fuse box. Attach the connector on the upfitter harness to the XL Linkable connector.





Aux Switch	Wire Color	Amp Rating
Aux 1	Bn/Gn	25
Aux 2	Vt/Og	25
Aux 3	Bu/Gn	25
Aux 4	Gy/Bn	25
Aux 5	Bn/Ye	40
Aux 6	Gy/Og	40

Carefully cut back the sheathing around the wiring till the black wire can reach the negative battery terminal without straining. Attach the black wire (J) to the negative battery cable and reattach the vehicle negative cable to the battery negative post. Place any excess wire into a service loop and secure it out of the way. The installation is now complete.



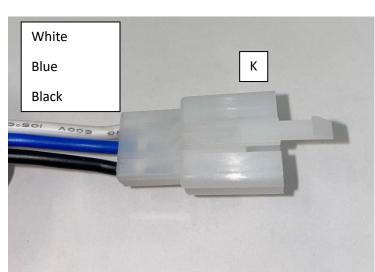


# **Toggle Switch Only**

Connect the connector that is now down behind the fog light to the XL linkable connector from Step 24. Run the switch lead across the firewall. Secure the relay where convenient. Zip tie the harness out of the way.

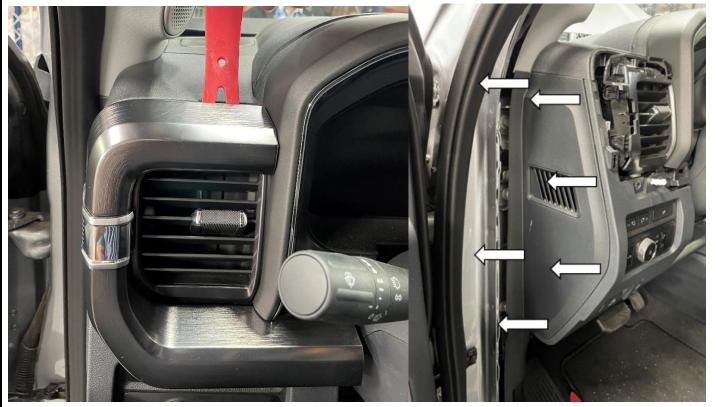


Locate the white connector (K) that attaches the switch to the main harness and disconnect it. With a pick, remove the wire terminals from the connector. Run the switch lead, terminals first, through the wire passthrough located in the drivers footwell (circled) from inside the cab. Pull the cable through once you are past the grommet and up to your main harness. Reinstall the terminals into the connector and reattach it to the main harness.

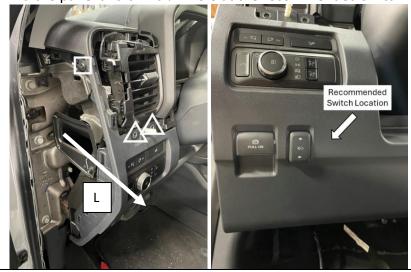




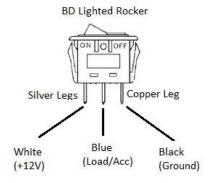
Remove the bezel from around the vent by prying at the edges and pulling directly backwards. Locate the panel on the side of the dash and remove the door seal around it. Gently pull outwards on the panel to remove it.



With a T20 Torx (boxed) and 7mm socket (triangle), remove the 3 screws securing the trim panel surrounding the headlight controls. Gently pull the panel diagonally downward (L) to allow access behind it. Check for clearance behind the panel and drill a ¾" hole at the recommended switch location.



Disconnect the spade connectors and run the wires through the newly created switch hole. Reconnect the wires and press the switch into place. Reinstall all the interior trim panels.



Using a 10mm socket, attach the red wire to the positive battery cable and the black to the negative battery cable. Secure any excess wire in a service loop and secure out of the way. Reconnect the negative battery cables and the installation is now complete.



\*Tie all wires away from sharp, hot, and/or rotating components.

\* Re-torque all the fasteners after 100 miles.

\*Your install is now complete! Thank you for choosing Baja Designs.