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THE SCIENTISTS OF LIGHTING

**Ford Super Duty (20-On)
Dual Squadron 2.0 Fog Light Kit**



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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 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.

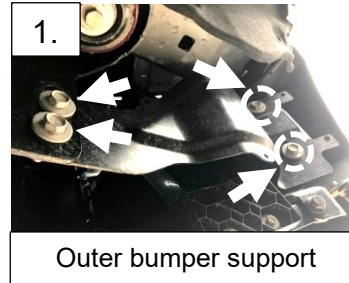
Buyer is responsible for ensuring that it uses the products (and its vehicle) in accordance with all applicable laws, regulations, guidelines, and standards of care. Buyer acknowledges that some products may only be used when off-roading, and Buyer will comply with all vehicle and road safety guidelines. 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.

Ford Super Duty Dual Squadron 2.0 Fog Light Kit Instructions

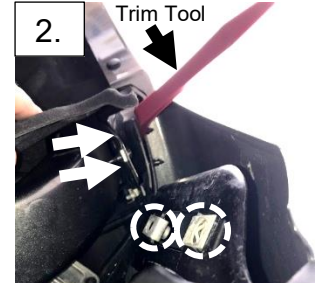
Tools Required

<ul style="list-style-type: none"> - 9/16" Wrench and Socket - 8mm, 10mm, 13mm, 15mm Sockets - 4mm Allen wrench 	<ul style="list-style-type: none"> - Pliers - T25 Torx - Flathead Screwdriver (Trim tool)
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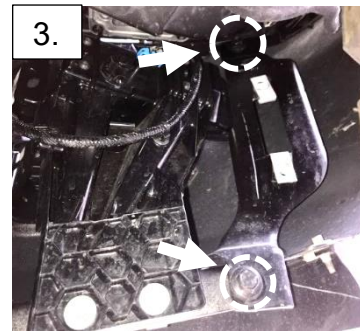
1. To begin, use the 15mm socket to remove the four arrowed bolts that hold on the outer bumper support bracket in the passenger side wheel well. Carefully set bracket aside.



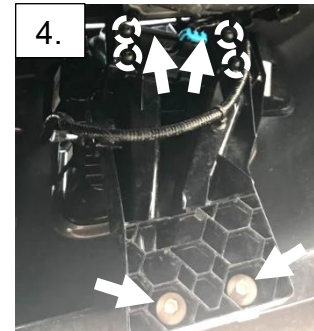
2. Use the flathead screwdriver to pry the two clips as shown to expose the 13mm bolt. Image is the underside view of the front passenger side wheel well. (Dashed circles are the same outer bolt locations from step 1)



3. On the outer bumper bracket, use the 13mm socket to remove the lower arrowed bolt and the 13mm wrench to remove the upper arrowed bolt. Place the bracket aside.



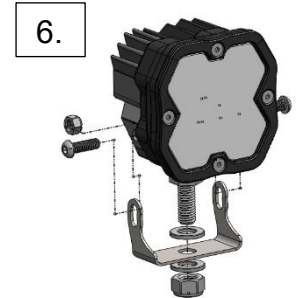
4. Use the T25 Torx to remove the four circled bolts. With the 8mm socket wrench, remove the four arrowed bolts and carefully slide the loose assembly out toward the wheel well. Disconnect the fog light connector. Remove the plastic fog light bracket and then remove the OEM fog light. Both will not be reused.



5. Use the pliers to squeeze the clips circled from inside the bumper and push out the OEM fog light fascia. Repeat steps 1-5 for the opposite side.



6. Assemble all four squadron 2.0 lights with the 4mm Allen wrench, 9/16" wrench, and 9/16" socket. (Assemble 3/8" hex head hardware into the squadron 2.0 brackets first.)



7. With the provided adhesive backed rubber, cut it in half lengthwise. Apply material to the edges of each fog bracket as shown and trim to fit.



8. Mount each squadron 2.0 onto the Baja in the desired configuration using the 9/16" wrench and socket. Mount the Baja Designs fog bracket onto the bumper from the outside and hand thread on the washers and nuts. Carefully adjust the bracket to sit nicely in the bumper contours and then gently tighten the nuts with the 10mm wrench. **Do not over tighten as the studs can pull through.**



9. Attach the provided Anti-back feed harness to the SAE light intended to be switched with the OEM fog light switch. Connect the H10 in-line adapter to the same harness and plug into the OEM fog light connector. Repeat for opposite side. (Wiring diagram on next page)

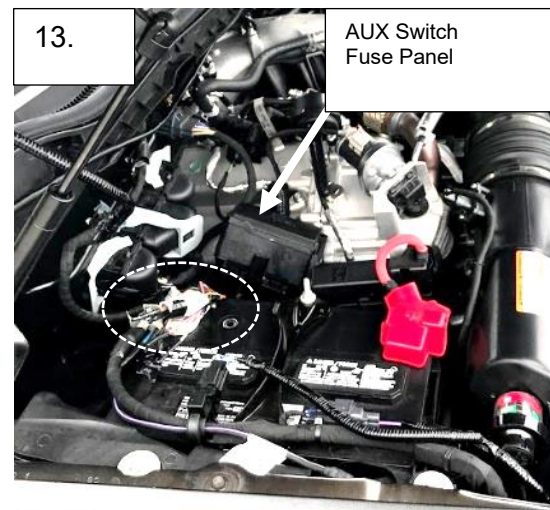
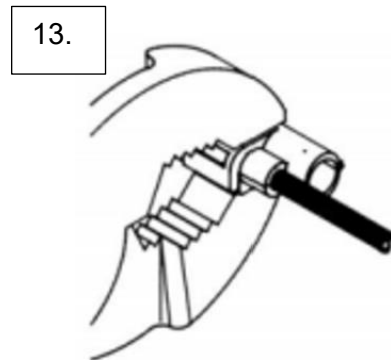
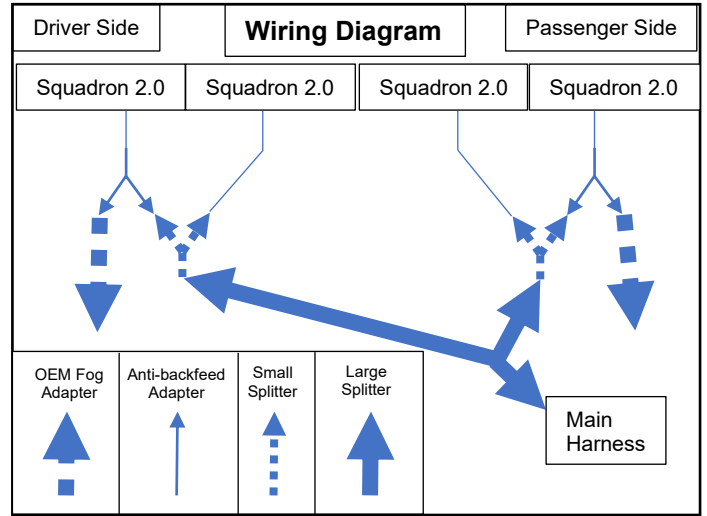
10. Plug in the small splitter ends to each light. Repeat for other side, and connect the small splitter into the larger splitter harness. Route the large splitter to both sides with the main harness plug on the passenger side. Plug in the small splitter to each end of the large splitter wiring. It should look like the diagram on the following page.

11. Open the hood. Unravel the harness and route the light lead of the harness down behind the passenger side headlight (also behind the air cleaner).

12. Pull the plug from behind the front passenger side inner fender well and plug it into the large splitter.

13. If you purchased the Upfitter switch version:

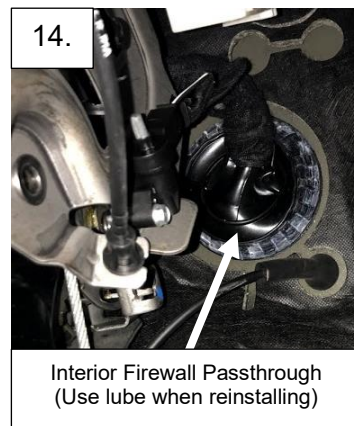
- Find the small fuse panel in between the battery and the engine on the passenger side and pull up while squeezing the tabs to release. Underneath the panel, remove the tape on the bundle of wires to expose the auxiliary switch panel wires. AUX 1,2,3,4, are brown with green stripe, violet with orange stripe, blue with green stripe, and gray with brown stripe respectively (25A max).
- Using the pliers, clasp the splice connector on the reverse splice harness over the desired wire/circuit as seen in image 13. Wrap the tape back over the remaining wires. Make sure all wires are isolated and add electrical tape as needed.
- Mount the black ring terminal of the splice harness to the common ground on the inner passenger fender using a 10mm socket wrench.



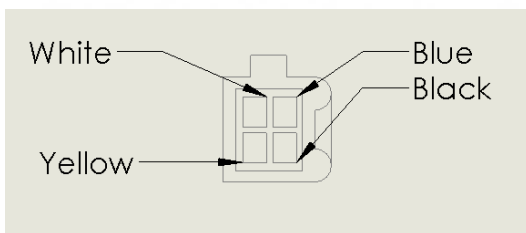
14. If you purchased the stand-alone version:

- Locate the firewall passthrough grommet on the right of the brake booster. In the cab, this will be located to the right of the parking brake. Push grommet into engine compartment. Gently pull dash panel away until unclipped.
- Snap a photo of the BD switch wiring for reference later. Remove the switch terminals from the switch. Remove the tape around the wires on either side of the grommet.
- Locate a desired dash location for the switch and confirm that there is clearance behind. Drill hole.
- Feed the wires through the hole in the passthrough grommet following OEM wires, through the hole in the dash. Reattach the switch terminals, and mount the switch, Tape around the wires of the grommet. Install dash panel.
- Mount the (+) and (-) ring terminals of the harness to the corresponding battery terminals starting with the (+) red lead.

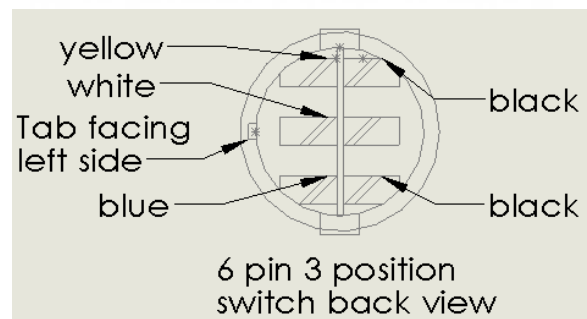
Tie the entire harness away from any hot, sharp, and/or rotating components. Excess length should be wound and tied into an appropriate location (i.e. inner fender cavity).



14.



14.



Re-torque all the fasteners after 100 miles.

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

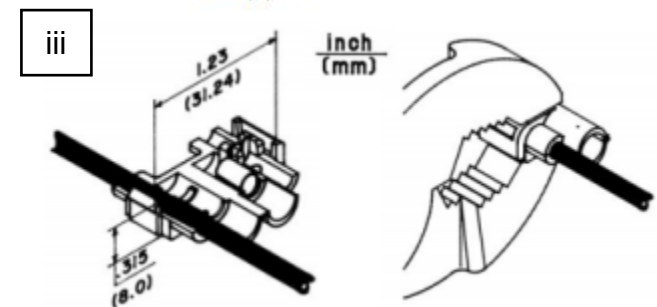
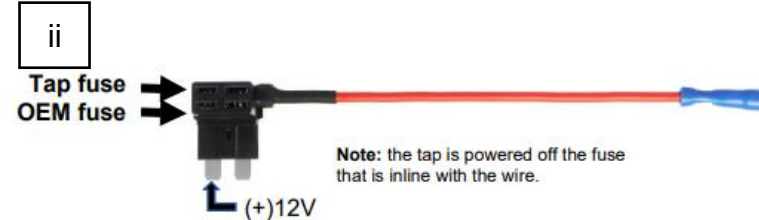
Backlight add-on harness instructions for Squadron 2.0

Note: Included with this harness is four fuse taps. In the event that none will work for your application, a splice connector is included (shown on right).

1. Locate the fuse panel in the engine compartment. Remove cover.
2. Observe the inside of the fuse box cover, or the owner's manual to determine fuse locations and functions. The goal is to find a suitable circuit that is powered on when the vehicle is turned on. It is important to choose a fuse location that does not power sensitive electrical components, such as sensors and ignition modules. Choose a fuse that is activated by turning the key and remains active while the vehicle is starting and running. The IGN fuse is highly recommended for this. Using other circuits to run the backlight may result in the color changing when not desired.
3. Once the fuse location has been chosen, the multimeter or test light will be used to determine which side of the fuse is power and which side is the output. Using either tool, touch the positive test lead to one side of the fuse socket and touch the negative lead to the negative battery post, or any convenient ground. With the keys in the off position, neither side of the fuse socket should have power. If they do, another fuse location will need to be chosen.
4. Now, turn the keys to the on position and measure each side of the fuse socket. When the test light illuminates, or the multimeter DC voltage measures 12-14V, the power side of the fuse has been determined. Insert the fuse tap into the socket with the arrowed side blade (shown in image ii) contacting the power side. Plug in the backlight harness to the female bullet receptacle of the fuse tap. If the fuse socket originally had a fuse, place it into the open socket on the fuse tap.
5. Every fuse panel is different and sometimes there are adjacent components that make it difficult or impossible to plug in a fuse tap. In this case, the splice connector will need to be used. Find a wire that is powered when the keys are on. Ideally, this wire would power the daytime running lights and not an electrically sensitive component like a sensor. With the backlight harness inserted into the female bullet receptacle of the splice connector, clamp the splice over the desired power wire and clamp with pliers until an audible click is heard. (See image iii for reference)

Tools Required

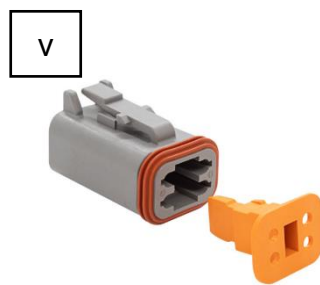
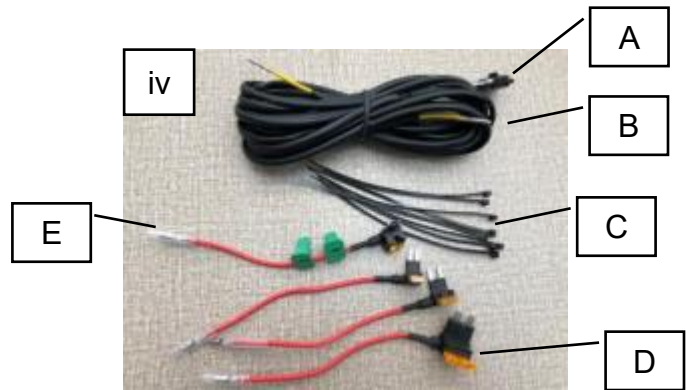
- Trim Tool (Or Flathead Screwdriver)
- Scissors
- Test Light, or Multimeter



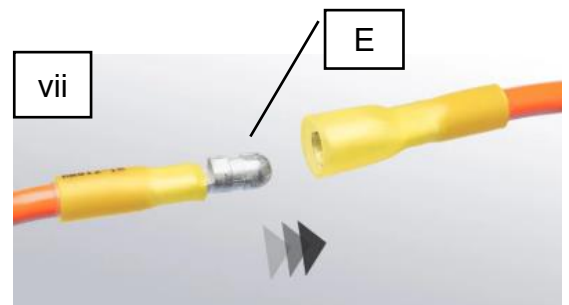
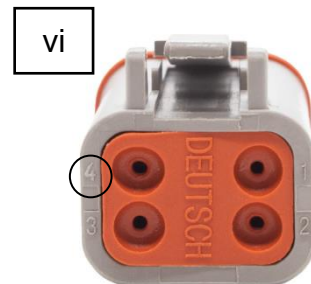
Fuse tap kit part #: 63-9209

Backlight add-on harness instructions

6. Use the provided 5-amp fuse in the fuse tap for the backlight add-on harness (See image ii for reference).
7. Remove the Wedge lock from the plug by using a flat head screwdriver and **gently** prying along the edges with a flathead to release the lock (see image v for reference)
8. Locate the backlight add-on harness supplied in the kit. If a cavity plug was inserted previously in the PnP (Plug-n-Play) adapter, please remove it and insert the terminal inside the (3) pin location. (See image vii for reference)
9. To reinstall the wedge lock, simply push the wedge lock back in until it clicks in. (See image v for reference)
10. Determine the best routing for the backlight add-on harness.
11. Connect the bullet connector from the backlight add-on harness to the fuse tap and secure the wire harness. (Use image iii for reference)
12. Turn on the vehicle and test to see if the backlight function on the Squadron 2.0 works appropriately.
13. Use included zip ties to tie the harness out of the way of any hot and/or rotating components.



A: Splice connector
B: Harness
C: Zip ties
D: Fuse taps
E: Bullet connector



Backlight switch adapter instructions

1. Connect the bullet connectors from the switch inline between the fuse tap and the backlight add-on harness.
2. Turn the switch on and off until the desired color is displayed as the backlight.
3. Once the desired color has been achieved, the switch can be either removed or left in. To remove the switch, turn the vehicle off and remove the switch. Reconnect the bullet connectors between the fuse tap and the backlight add-on harness. To leave the switch in line, secure the switch so it does not move. **Be sure to always leave switch in the “on” position if the switch will be left in.**



Inline switch part #: 60-0071