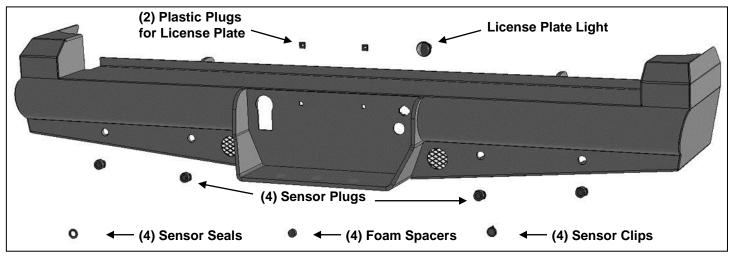
PARTS LIST:

1	HD Replacement Rear Bumper Assembly	4	Sensor Hole Plugs
1	License Plate Light	1	Sensor Cover Kit
4	Retaining Ring	2	Plastic Plugs for license plate mount
4	Foam Spacer Washer 20mm x 10mm	8	4mm x 10mm Button Head Bolts
4	Sealing Washer	1	2.5mm Wrench



PROCEDURE:

REMOVE CONTENTS FROM BOX. VERIFY ALL PARTS ARE PRESENT. READ INSTRUCTIONS CAREFULLY BEFORE STARTING INSTALLATION. BUMPER IS HEAVY, ASSISTANCE IS RECOMMENDED TO AVOID POSSIBLE INJURY OR DAMAGE TO THE VEHICLE.

- 1. Remove the license plate from the bumper, **(Figure 1)**. Unplug the wiring harness leading to the bumper and move harness away from bumper.
- 2. Place blocks or jack stands under the bumper to support it during mounting bolt removal. Once the bumper has been safely supported, remove the (2) factory bolts attaching the bottom of the bumper (step area) to the receiver hitch, (Figure 1). Next, remove the factory hardware attaching the bumper to the bumper brackets and remove the bumper assembly, (Figure 2). WARNING! Assistance is required to hold the bumper in place during hardware removal to prevent bumper from falling.
- 3. Next, remove both bumper brackets from the frame, (Figure 3).
- **4.** Remove sensors, (if equipped), from bumper. Release the clips securing the trailer plug and remove the plug. Remove the wiring harness from the bumper. Next, remove the spare tire plug lock if equipped, **(Figure 4)**.
- 5. Install the spare tire hole plug lock, License Plate Light and trailer plug into the Steelcraft Bumper, (Figure 9). NOTE: Use a flat blade screwdriver to carefully pry out the metal clips on the trailer plug to grab the edge of the opening if necessary.
- **6.** Determine if the vehicle is equipped with sensors. **NOTE**: It may be necessary or easier to install sensors, (if equipped), and harness before installing the Bumper.

Models without bumper sensors:

- a. Select the included (4) Rubber Plugs, (Figure 5).
- **b.** From behind bumper, push plugs into sensor mounting sleeves, **(Figure 5)**. Screws have been provided to lock the plugs into the sleeves. Use is optional.

Models with bumper mounted sensors:

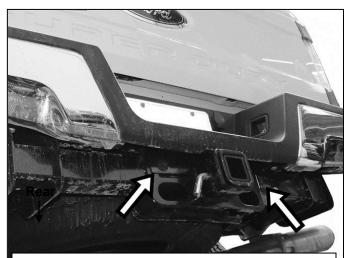
- **a.** Select (1) sensor. Test fit sensor in mounting sleeve. It may be necessary to cut or grind off the tabs on the sides of the sensor to fit into the sleeve.
- **b.** Remove the seal from the end of the sensor, **(Figure 6)**. Slide the included larger Sensor Seal over front of the sensor.
- c. Insert the sensor with Seal into sensor mount, (Figure 7).
- **d.** Place the thick Foam Spacer over end of the sensor. Push Sensor Retaining Clip into sensor mount and lock into mounting holes, **(Figure 7)**.

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- **e.** Repeat previous Steps to install remaining sensors.
- **f.** Install wiring harness for sensors.
- g. Optional: Secure each sensor to the socket with (2) 4mm x 10mm Button Head Screws, (Figure 6). IMPORTANT: Sensors fit snug in sockets. The 4mm Screws are used to apply slight pressure to lock the sensors in place. Tighten both screws evenly until they touch the sensor body only. Do not overtighten screws or damage to sensors will result.
- 7. Attach the wiring harness to the sensors, license plate light and trailer plug as equipped.
- **8.** With assistance, hold the Bumper assembly up to the frame. Temporarily support the weight of the Bumper. **WARNING**: To avoid possible injury or damage to the vehicle, do not proceed until the bumper is fully and safely supported.
- **9.** Reuse the factory hardware to attach the passenger/right side of the Bumper to the frame, **(Figure 8)**. Repeat this Step to attach the driver/left side of the Bumper to the frame. Snug but do not fully tighten hardware at this time.
- **10.** Level and adjust the bumper and slowly lower the tailgate and check for clearance. Adjust the bumper as required and fully tighten all hardware to 65-70ft-lbs.
- **11.** Do periodic inspections to the installation to make sure that all hardware is secure and tight.
- 12. Use the included (2) push-in plugs to attach the license plate to the Bumper, (Figure 9).
- **13.** Plug in the wiring harness on the bumper to the main harness on the vehicle.
- **14.** Do periodic inspections to the installation to make sure that all hardware is secure and tight.

To protect your investment, do not use any type of polish or wax that may contain abrasives that could damage the finish. Mild soap may be used to clean the Bumper assembly.

Passenger Side Installation Pictured



(Fig 1) Remove the (2) bolts attaching the bottom of the step to the receiver hitch if equipped



(Fig 2) Remove the factory hex nuts attaching the bumper to the brackets (arrow)

WARNING! Do not crawl under bumper unless the bumper is properly supported on blocks or stands or the bumper may fall.

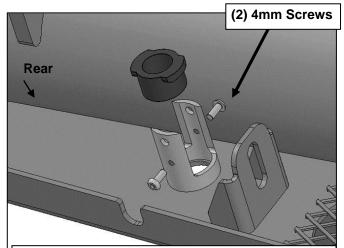
Passenger Side Installation Pictured



WARNING! Do not remove bumper bolts unless the bumper is properly supported on blocks or stands or the bumper may fall.

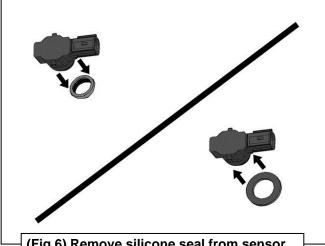


(Fig 4) Remove sensors, wire harness, trailer plug and spare tire access lock (pictured) if equipped



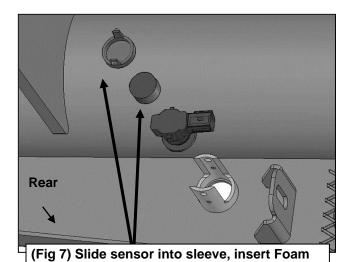
(Fig 5) Push sensor hole plug into mounting sleeve. Use 4mm Screws to lock sensor in place.

NOTE: Sensor plugs fit snug in sockets. Use of the 4mm Screws is optional. 4mm Screws can also be used to apply slight pressure to lock the sensors in place or to aim the sensor. Tighten both screws evenly until they touch the sensor body only. Do not overtighten screws or damage to sensors will result.



(Fig 6) Remove silicone seal from sensor. Slide large Seal over end of sensor (arrow)

Passenger Side Installation Pictured



Spacer and Clip to lock sensor in sleeve

WARNING! Do not crawl under bumper unless the bumper is properly supported on blocks or stands or the bumper may fall.

