

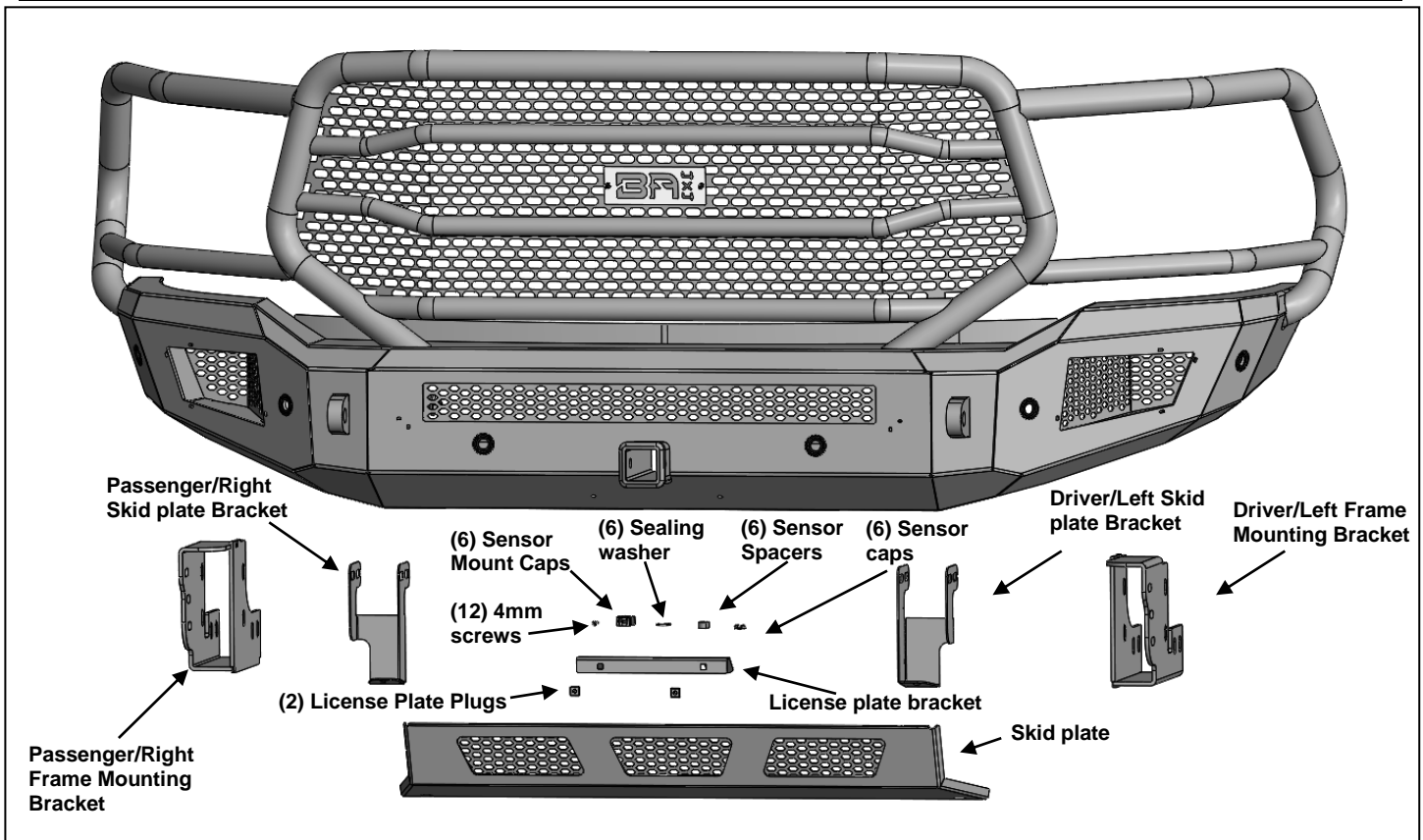


INSTALLATION INSTRUCTIONS

Ambush Front bumper with Grille for 10-18 Ram 2500/3500HD PART #DG-20338

PARTS LIST:

1	Ambush front bumper w/GG	4	8-1.25mm x25mm Hex bolt
1	Driver/Left mounting bracket	2	8-1.25mm x 25mm Combo bolt
1	Passenger/Right mounting bracket	2	8-1.25mm x16mm Hex bolt
1	Mesh Plate	10	8mm x 24mm x 2mm Flat washer
2	LED mounting brackets	4	8mm Lock washer
2	Plastic plug for license plate (5mm plate)	4	8mm Hex nut
1	Skid plate	2	8mm Nylon lock nut
1	Driver/Left support bracket	3	6-1.00mm x 20mm Combo Allen bolt
1	Passenger/Right support bracket	2	6-1.00mm x 20mm Button head bolt
8	12-1.75mm x 100mm Hex bolt	4	6mm x 18mm x 1.6mm Flat washers
6	12-1.75mm x 40mm Hex bolt	2	6mm Nylon lock nut
28	12mm x 37mm x 3mm Flat washer	2	S=4 wrench
8	12mm Lock washers	6	Sensor Retaining Clips
6	12mm Nylon lock nut	6	Sensor Caps
8	12mm Hex nuts	6	20mm x 10mm Sensor Spacer (self-adhesive)
		6	Sensor Sealing washer (self-adhesive)
		1	Sensor cover kit
		12	4mm Self tapping screws





INSTALLATION INSTRUCTIONS

PROCEDURE:

1. REMOVE CONTENTS FROM BOX. VERIFY ALL PARTS ARE PRESENT. READ INSTRUCTIONS CAREFULLY BEFORE STARTING INSTALLATION. BUMPER IS HEAVY, ASSISTANCE IS HIGHLY RECOMMENDED. CUTTING MAY BE REQUIRED.
2. Remove the license plate. On models with bumper mounted sensors, unplug the wiring harness leading to the front bumper, **(Figure 1)**. Move all wiring harnesses away from bumper.
3. Open the front hood and temporarily remove the top plastic cover between the radiator and the grille. Next, remove the plastic radiator grille for easier access to top bumper bracket bolts, **(Figure 2)**. **NOTE:** Pay close attention to the type and location of all factory hardware for reinstallation. Move the grille and cover to a clean surface.
4. Release the clips attaching the lower splash guard to the back of the front bumper, (if equipped). Locate the factory bumper bolts attaching the outer bumper to the inner brackets, **(Figure 3 & 4)**. With assistance, remove the bumper assembly, **(Figure 5)**. **WARNING!** Assistance is required to hold the bumper in place during hardware removal to prevent the bumper from falling. Slide the bumper assembly off of the tow hooks.
5. Next, remove the (2) tow hooks. Remove the inner bumper brackets and lower frame extensions from the end of the frame, **(Figures 5—7)**. **NOTE:** Lower frame extensions cannot be reinstalled, **(Figure 4)**. **IMPORTANT:** On some models equipped with turbo diesel, the intercooler and lower mounting bracket will need to be loosened or removed to remove the double bolt plate attaching the bumper bracket to the end of the frame. Assistance is recommended. **OPTION:** To remove the double bolt plates without removing the intercooler, use a hacksaw to cut the threaded ends off of the double bolt plates. Reinstall the intercooler and brackets, (if removed), once bolt plates and bumper brackets have been removed, **(Figures 6 & 7)**.

Passenger side installation below

6. Select (1) Passenger/Right Mounting Bracket, install the Bracket over the frame where it will surround the frame. Use the provided (2) 12mm x 100mm Hex Bolts, (4) 12mm Flat Washers, (2) 12mm Lock Washers, and (2) 12mm Hex Nuts, **(Figure 8a)**. **NOTE:** Insert bolts through Frame Bracket and out through the frame on the opposite side. Leave hardware loose on the frame **(Figure 8b)**
7. Select (1) Passenger/Right Skid plate bracket and install it over the mounting bracket and frame at the lower two slot positions. Use the provided (2) 12mm x 100mm Hex Bolts, (4) 12mm Flat washers, (2) 12mm Lock washers, and (2) 12mm Hex Nuts **(Figure 9)**. Snug but do not fully tighten hardware at this time. Repeat this Step to install the Driver/Left side Frame Bracket.
8. Determine if factory bumper is equipped with parking sensors.

Models without bumper sensors:

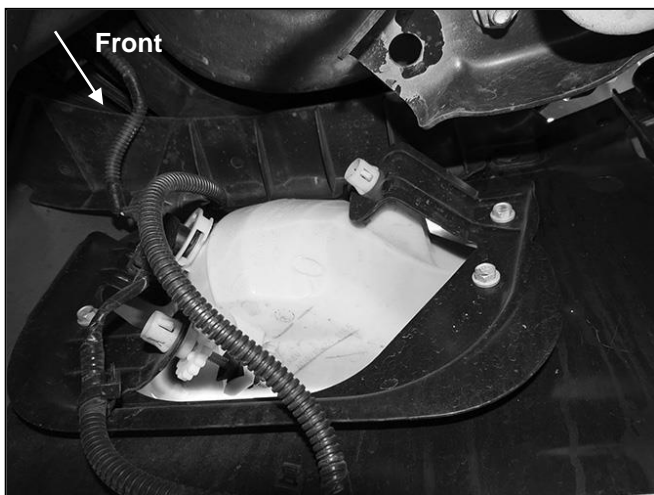
- a. Insert (1) Sensor Cap into the outer hole in the Sensor sleeve, from the outside **(Figure 10)**.
- b. Repeat to plug remaining (5) mounting holes in Bumper. Continue to **Step 9**.

Models with bumper mounted sensors:

- a. Carefully remove (1) sensor from the back of the OE bumper. **NOTE:** Sensors and harness must be installed in Bumper before installing Bumper Assembly.
- b. Remove the OE Sensor seal and replace with the provided sealing washer. Peel off the self-adhesive cover and apply the sealing washer to the front of the sensor **(Figure 11a)**
- c. Push the sensor into the Mount from the back of the Bumper until it is flush with the front of the Mount.
- d. Peel off the self-adhesive cover and apply (1) Foam Spacer onto the back end of the sensor, **(Figure 11b)**.
- e. Snap (1) Sensor Retaining Cap onto the Sensor Mount, **(Figure 11b)**.
- f. **Optional:** use (2) 4mm Self-tapping screws to secure the sensors
- g. Repeat the previous Steps to install the remaining sensors.

- h. Starting on the driver/left side of the bumper, connect the OE sensor wire harness to the first two driver/left side sensors and continue across the entire bumper. **NOTE:** Route the OE Sensor wire harness through the wire cutouts on the bumper.
- 9. Install LED brackets into bumper using (1) 8mm x 25mm Hex bolts, (2) 8mm Flat washers, (1) 8mm Lock washer, and (1) 8mm Hex nut (**Figure 12**). Repeat for other side
- 10. Install Mesh plate onto LED brackets using (1) 8mm x 25mm Hex bolts, (2) 8mm Flat washers, (1) 8mm Lock washer, and (1) 8mm Hex nut (**Figure 13**). Repeat for other side
 - a. If installing LED bar, use 8mm x 16mm Hex bolt instead
- 11. With assistance, position the Bumper assembly up to the (2) Frame Brackets. **WARNING:** To avoid possible injury or damage to the vehicle, do not proceed until the Bumper is fully and safely supported.
- 12. Line up the (3) holes in the driver/left side of the Bumper with the Frame Bracket on the **inside** of the bumper mounting tabs. Attach the Bumper to the Bracket with the included (3) 12mm x 40mm Hex Bolts, (6) 12mm Flat Washers and (3) 12mm Nylon Lock Nuts, (**Figure 14**). Do not fully tighten hardware at this time. Repeat to attach the passenger/right side of the Bumper to the Bracket.
- 13. Level and adjust the Bumper and fully tighten all 12mm hardware to 65-70ft-lbs.
- 14. Attach the License plate bracket to the bottom of the bumper using (2) 6mm x 20mm Button head bolts, (4) 6mm Flat washers, and (2) 6mm Nylon lock nuts (**Figure 15a**)
 - a. Insert the (2) license plate plugs into the license plate bracket. Reuse factory screws to attach license plate to Plugs (**Figure 15b**)
- 15. **WARNING:** To avoid possible injury or damage to the vehicle, do not proceed until the Bumper is fully and safely supported. Select the skid plate and install where the upper lip is on top of the bottom of the bumper so that the rivnut inserts are on the inside of the bumper. Use (3) 6mm Combo button head bolts to attach the upper portion of the skid plate to the bumper. Use (2) 8mm x 25mm Combo Hex bolts, (2) 8mm Flat washers, and (2) 8mm Nylon lock nuts to attach the skid plate to the skid plate brackets at the lower positions (**Figure 16**)
- 16. Use a sharp knife or hacksaw blade to cut off lower portion of fender liner as desired. (**Figure 17**)
- 17. Tighten all remaining hardware
- 18. Install 3in LED cubes into the LED pockets following their manufacturer instructions
- 19. 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



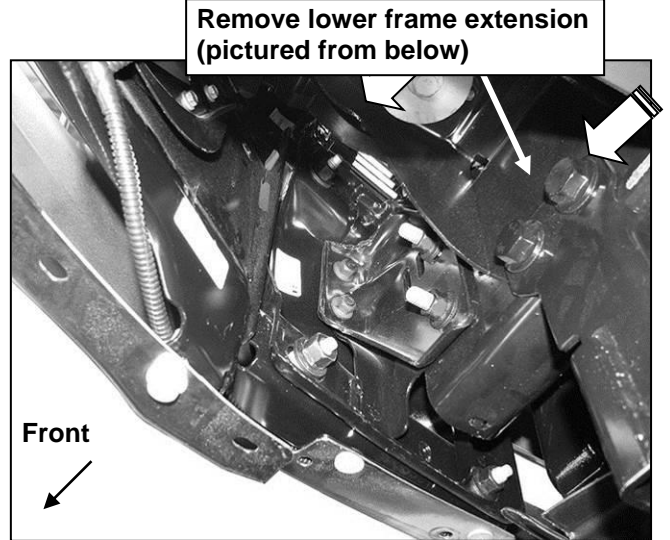
(Fig 1) Unplug wiring harness leading to front bumper



(Fig 2) Remove radiator top cover and grille



(Fig 3) Remove driver side top bumper hardware



(Fig 4) Remove driver/left lower bumper bracket hardware, (arrows-note pictured from below)

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



(Fig 5) Driver side factory bumper bracket and tow hook

Diesel models, loosen top support bracket hardware at frame and intercooler (large arrow). Temporarily remove lower hanging intercooler bracket from side of frame

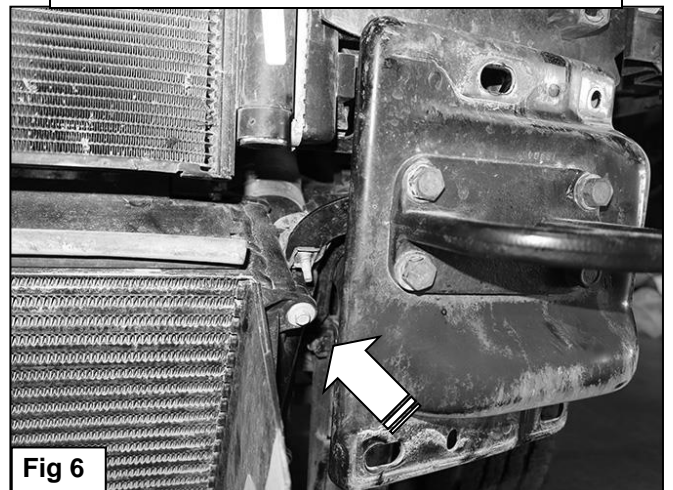
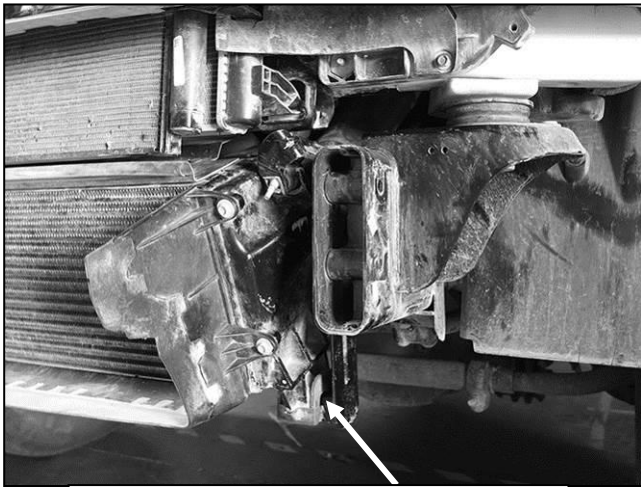
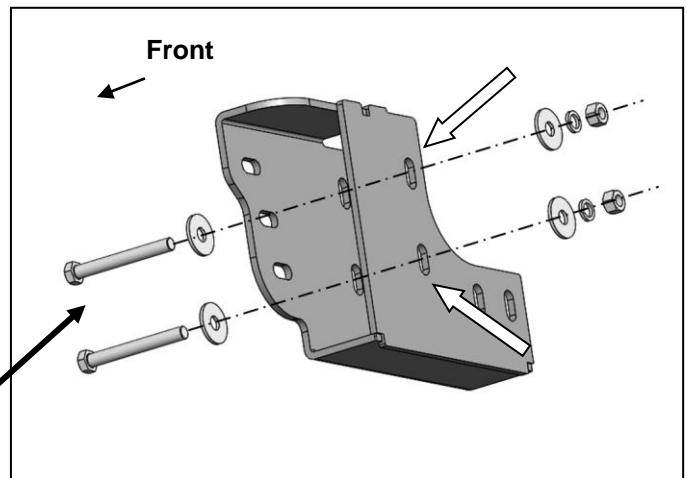


Fig 6

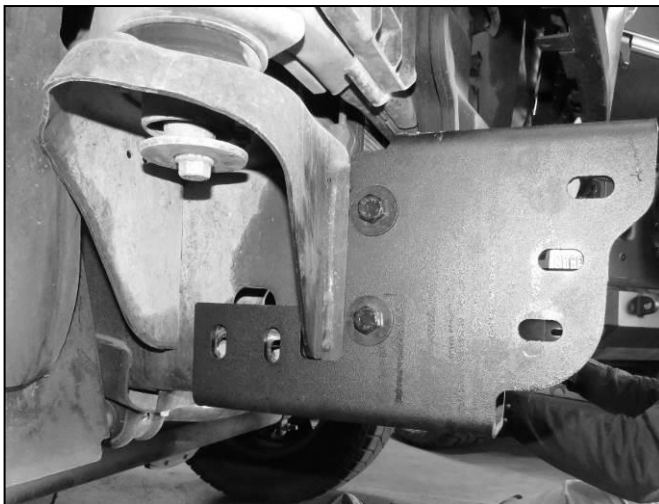


(Fig 7) Reinstall Intercooler brackets

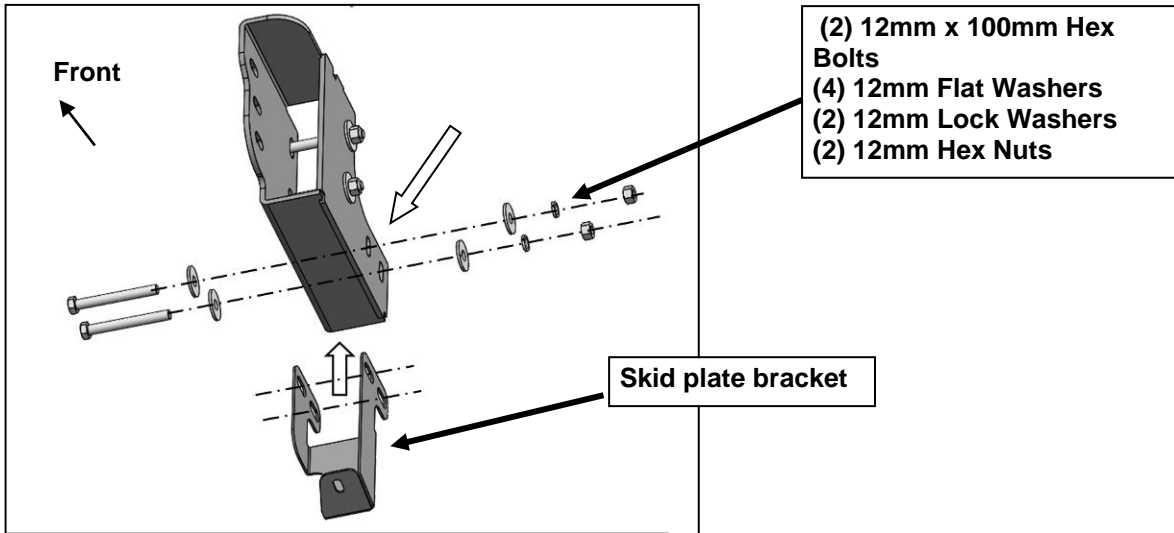


- (2) 12mm x 100mm Hex Bolts
- (4) 12mm Flat Washers
- (2) 12mm Lock Washers
- (2) 12mm Hex Nuts

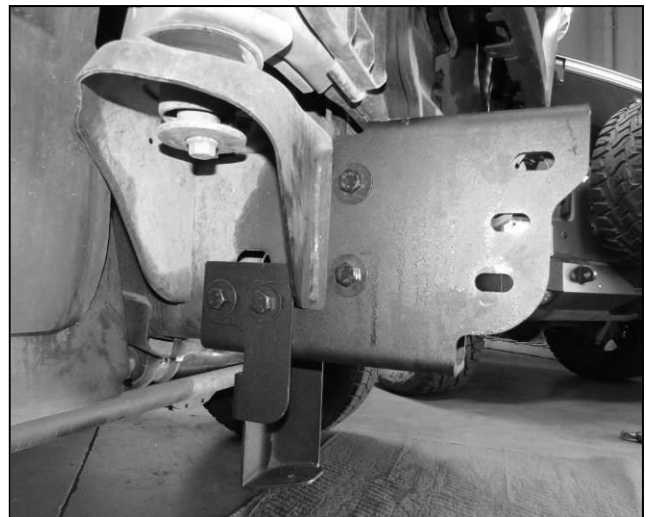
(Fig 8a) Install the Mounting bracket over the frame. Only install the front 12mm Hex Bolts initially



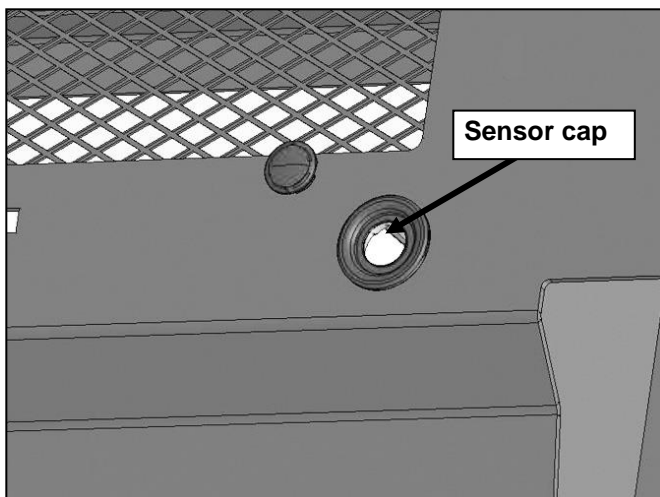
(Fig 8b) Mounting bracket installed over the frame



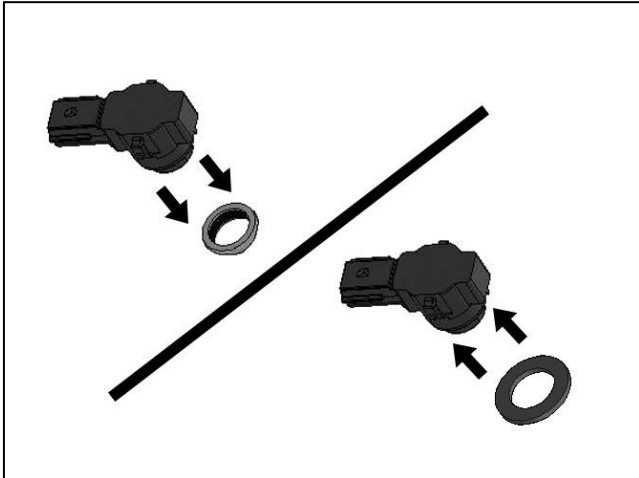
(Fig 9a) Install the skid plate bracket on the outside of the mounting bracket at the remaining lower two slots. The skid plate bracket will sandwich the mounting bracket and frame



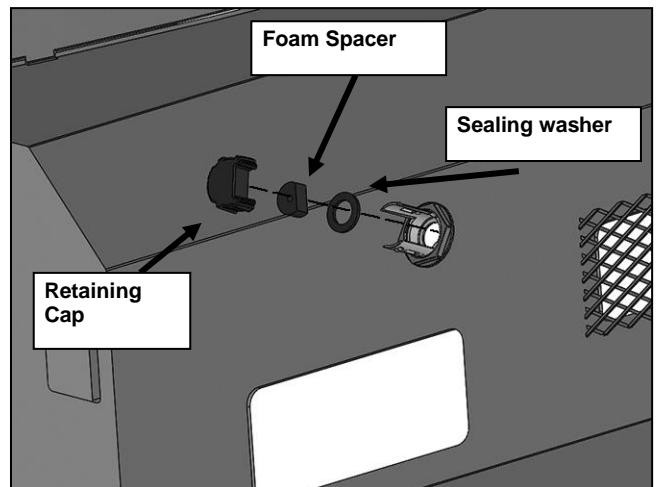
(Fig 9b) Skid plate bracket sandwiching the mounting bracket and frame.



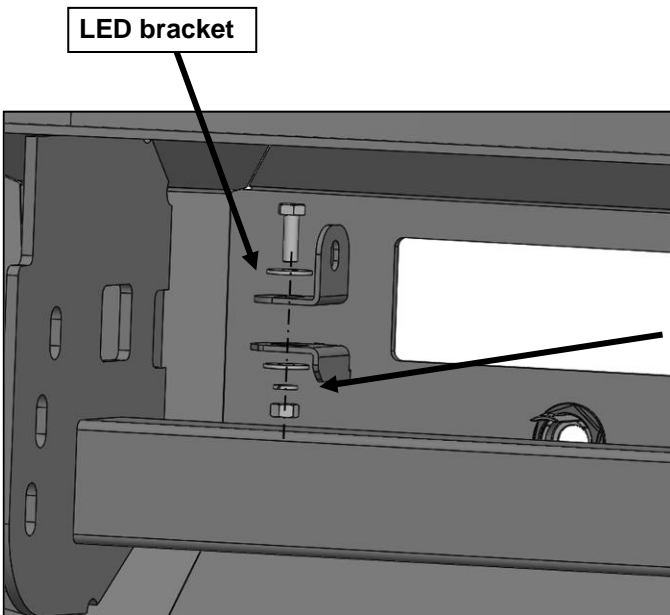
(Fig 10) Models without sensors, insert Plug into Mount



(Fig 11a) Remove silicone seal from OE sensor. Remove Self-adhesive tape and slide sealing washer over end of sensor



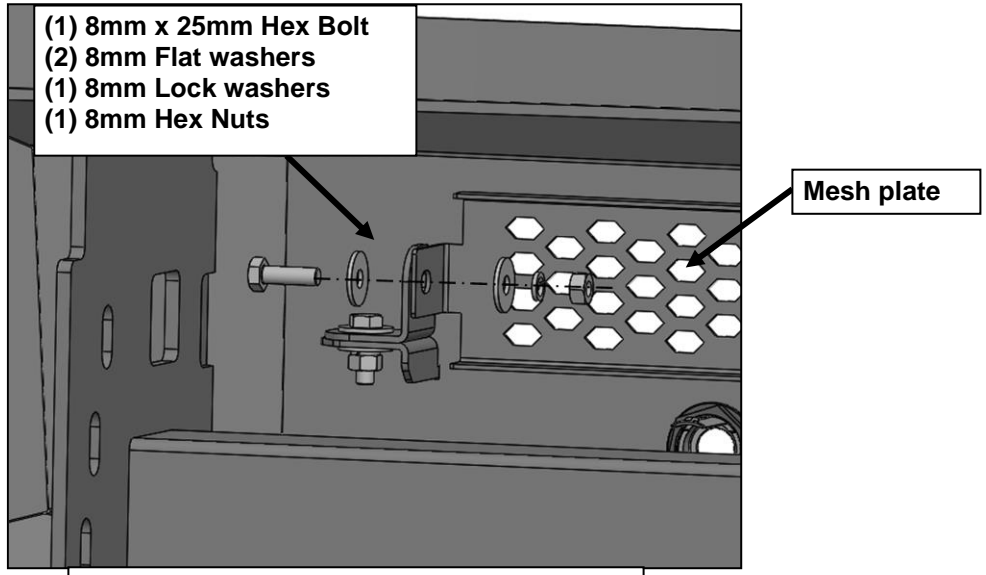
(Fig 11b) Insert sensor into back of Mount. Attach Foam Spacer to back of sensor. Snap Retaining Cap onto end of Mount and over sensor and Spacer



LED bracket

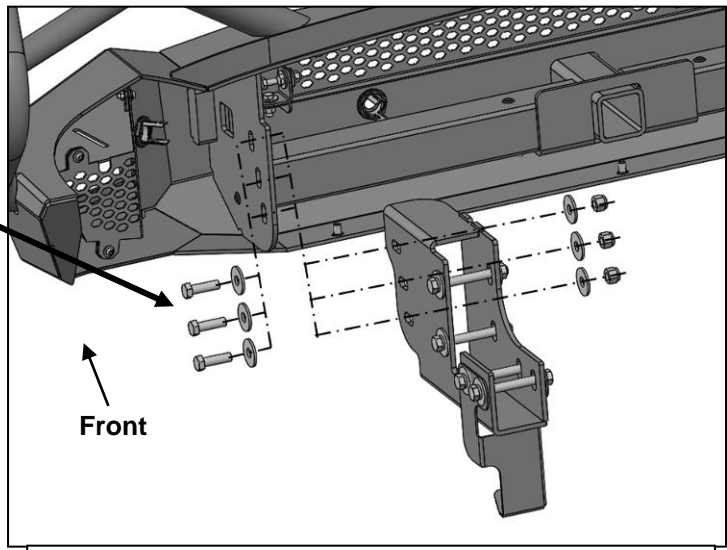
- (1) 8mm x 25mm Hex Bolt
- (2) 8mm Flat washers
- (1) 8mm Lock washers
- (1) 8mm Hex Nuts

(Fig 12) Install LED bracket into the bumper



(Fig 13) Install Mesh plate to LED bracket. If installing LED bar, please insert that in place of the mesh plate and use 8mm x 16mm Hex bolt

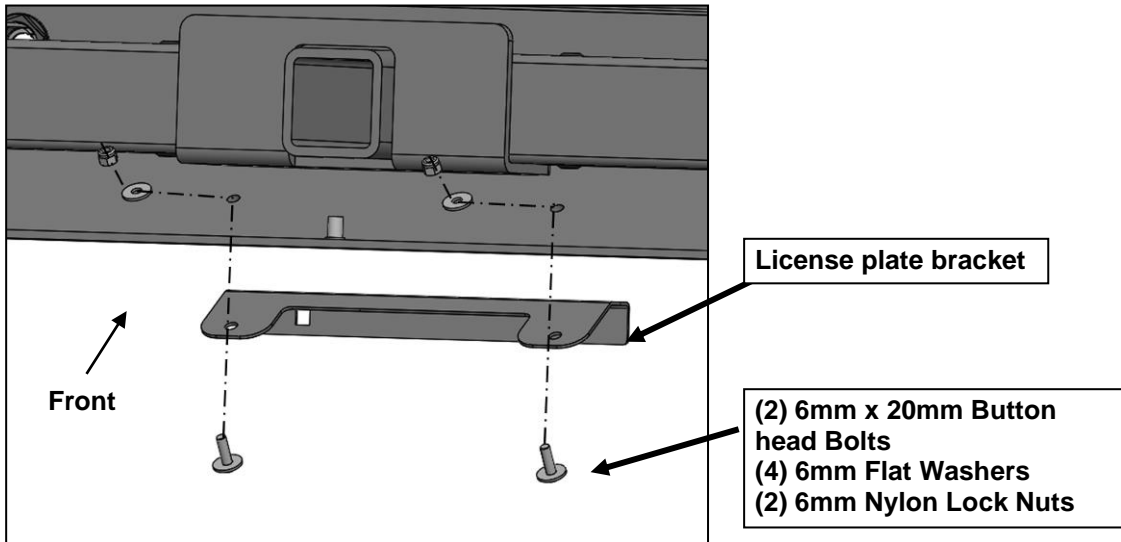
- (3) 12mm x 40mm Hex Bolts
- (6) 12mm Flat Washers
- (3) 12mm Nylon Lock Nuts



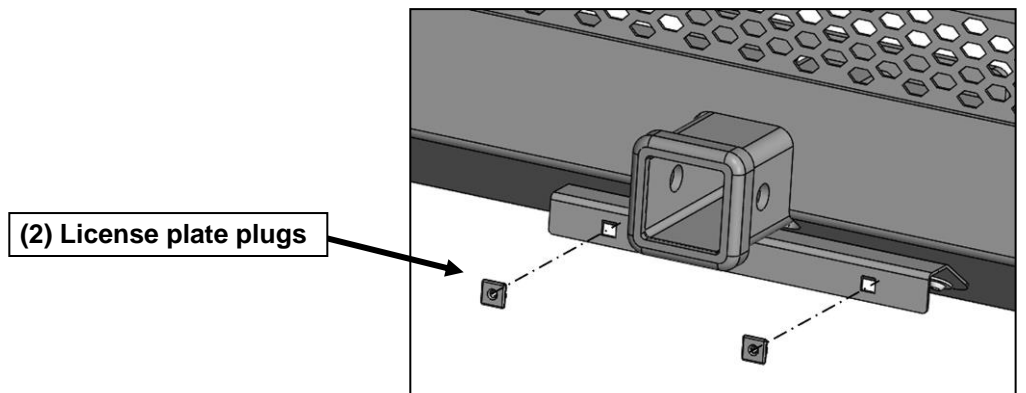
WARNING! Do not crawl under bumper unless it is properly supported on blocks or stands or the bumper may fall.

(Fig 14) Attach driver/left side of Bumper to Bracket. Repeat for passenger/right side

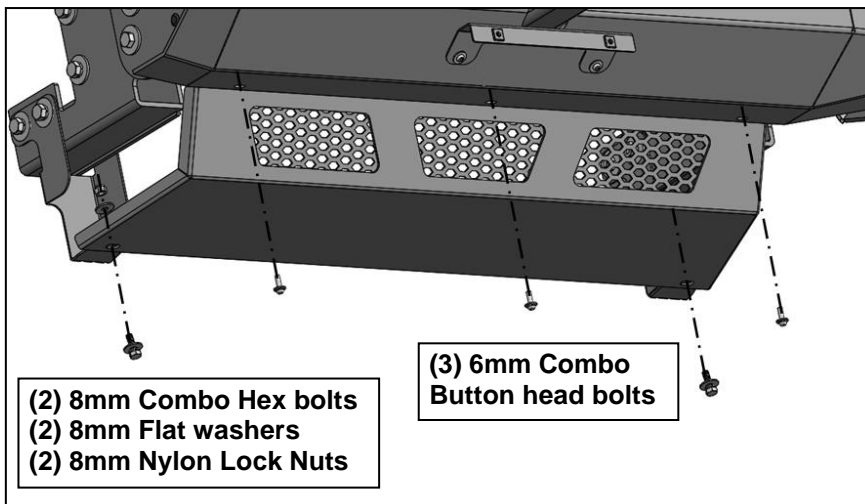
Adjust and level the bumper, then tighten M12 hardware



(Fig 15a) Attach license plate bracket to bumper



(Fig 15b) Insert plugs into license plate bracket



(Fig 16) Install skid plate onto the bumper and skid plate brackets

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



(Fig 17) Trim fender liners as desired using sharp knife or hacksaw



Complete Installation