Installation Instructions



Ford F-250 Adventure Series Rear Bumper Part #S/B613931





Introduction

Thank you for choosing Smittybilt accessories for your F-250. If you would like to view our full range of available accessories, please visit us at www.smittybilt.com







Important Notes Before Starting



IMPORTANT NOTE

Carefully read through this entire instruction manual thoroughly before attempting to install this part.



WARNING

Serious injury can occur when working on vehicles alone.

When possible, work with another person to reduce risk of injury from strain or other dangers that can occur when working alone.

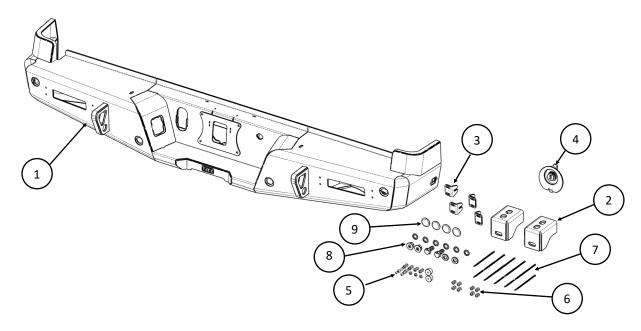
The following tools will be required to complete the installation of this part:

TOOLS REQUIRED					
Metric Wrench set	Flat Head Screw Driver	Propane Torch			
Metric socket set	Impact wrench				
Torque wrench	4mm hex key				
Breaker bar	Masking tape				



Box Contents & Technical Information

Product Technical Information



FORD F-250 Rear Bumper			
ITEM	DESCRIPTION	QTY	
1	F-250 Adventure series Rear Bumper	1	
2	Mount Bracket	2	
3	Adjustable 6" Light Bracket	4	
4	License Compartment Locking Cover	1	
5	HDW Pack, License Plate	1	
6	HDW Pack, Light Mounting	2	
7	HDW Pack, Cable Ties, 6"	1	
8	HDW Pack, Mounting Hardware	1	
9	HDW Pack, Panel Plugs	1	



Box Contents & Technical Information

	DESCRIPTION	QTY
90-60865	HDW Pack, Panel Plugs	1
	PANEL PLUG,	4

	DESCRIPTION	QTY
90-60864	HDW Pack, Mounting Hardware	1
	M14 PUSHNUT BOLT RETAINER	6
	M14X2X35 HHCS	2
	M14 FLAT WSHR	2

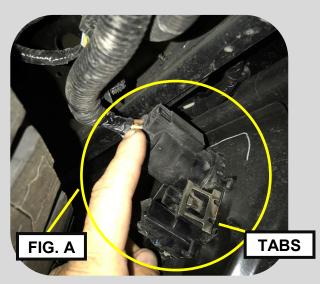
	DESCRIPTION	QTY
90-60862	HDW Pack, License plate	1
	RUBBER BUMPER	2
	M6X1 NYLOCK NUT	4
	M6 FLAT WSHR	8
	M6X1X10MM BHCS SS	2
	M6X1X12MM BHCS SS	2
	M6X1X16MM BHCS SS	2

	DESCRIPTION	QTY
90-60861	HDW Pack, Light Mounting	2
	M6X1 NYLOCK NUT	4
	M6 FLAT WSHR	4

	DESCRIPTION	QTY
90-60844	HDW Pack, Cable Ties, 6"	1
	CABLE TIE, STANDARD, 6" LONG	10



Installation Instructions: Rear Bumper Removal



Step 1: Trailer Plug Removal

Park the vehicle on a flat level surface. Apply the parking brake and chock all 4 wheels. Place masking tape on the areas of the rear fenders and tailgate that can be scratched by removal of the **OE** front bumper.

On the driver side, under the rear bumper, disconnect the trailer plug harness by depressing the tab and pulling firmly apart. Remove the trailer plug by squeezing the metal tabs on both sides and pushing out. (Fig. A)

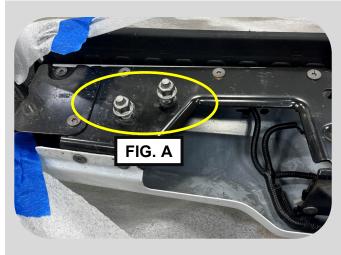


Step 2: Sensor Harness Removal

Disconnect the backup sensor wiring harness. (Fig. B)



Installation Instructions: Rear Bumper Removal



Step 3: Bumper Removal

Carefully support the rear bumper, remove the (2) **OE** main rear bumper mounting bolts and remove the bumper from the vehicle. (**Fig. A**)

NOTE: With the bumper removed, now is a good time to use additional masking tape on the truck body to prevent any unwanted scratches during install.



Step 4: Wire Harness Removal

On the **OE** rear bumper, disconnect the wiring harness from the license plate lights by depressing the tab and pulling apart. Remove the license plate lights by squeezing the tabs and pushing outward. (**Fig. B**)

Step 5: Sensor Bezel Removal

Remove the **OE** backup sensors from the sockets by marking the locations of each sensor. Spread the back of the sockets and pushing the sensors out from the front. (**Fig. C**) Remove the sensor bezel and note the location, these will be reused.







Installation Instructions: Rear Bumper Harness removal



Step 6: Spare & Tire Lock

Using the hidden key on your ignition FOB, unlock the spare tire lock and remove the spare tire hoist cover (Fig. A) This will be reused.

Step 7: Wire Harness Removal

Remove the plastic rivets securing the backup wiring harness to the **OE** rear bumper. **(Fig B)**

NOTE: Remove license plate at anytime during this process.





Installation Instructions: License Plate

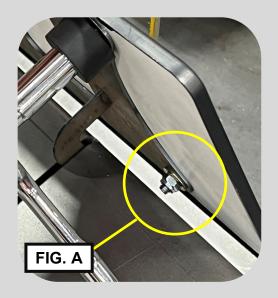


Step 8: Install License Plate

Install license plate to the license plate cover on the bumper. Using a 10mm socket and 4mm hex key.

Install the rubber bumper pieces on the bottom of the license plate cover using 16mm long screws.

NOTE: Make sure to use the correct length (shortest possible) hardware on the top of the license plate cover, so that it does not scratch the paint when opening. **(Fig A).** Longer hardware is supplied for use with license plate frames.



Step 9: Install Cubby Lock

See separate instructions provided with compartment locking cover SB2764

Default code: (000)





Installation Instructions: Rear Bumper Install



Step 10: OE component install

Install the license plate lights, backup sensors, trailer plug, and spare tire lock onto your SB Rear bumper.

NOTE: Install the sensor bezels into their original locations and orientations. Bezels may be marked with their locations. R.I.L. indicates **Rear**, Inner, **Left** position, for example



NOTE: The FORD emblem will be marked on the top side of the lights.



Installation Instructions: Rear Bumper Assembly



Step 11: Sensor Wire Harness Install

Connect the **OE** wiring harness to the **OE** license plate lights. Secure the wiring harness to the SB Rear bumper using the **OE** plastic rivets or zip ties.

NOTE: Be sure there is adequate slack and the harness is not pulling on any of the lines. Re-rout the harness if necessary



Step 12: Light Bar Install

If installing 6" light bars, do so at this time using the supplied hardware

WARNING: TIGHTEN LIGHT MOUNTING HARDWARE TO A MAXIMUM OF 45 IN-LBS

NOTE: (light bar not included)



Installation Instructions: Rear Bumper Install

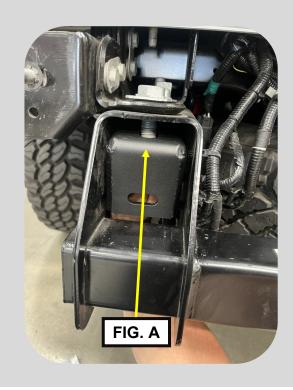


Step 13: Mounting bracket install

Remove the OE receiver hitch hardware (qty. 4) and install supplied mounting brackets. Re-use OE hardware (Fig A & B)

NOTE: Keep the mount brackets loose, to adjust the bumper before torquing to spec.

NOTE: Use a Breaker Bar or Impact wrench to break **(OE)** hitch receiver hardware loose. Propane Torch may be needed to heat the **(OE)** thread locking compound







Installation Instructions: Rear Bumper Install

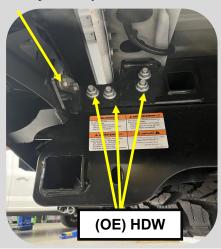


Step 14: SB Bumper Install

Install the SB Rear Bumper using the **(OE)** hardware. Push nut retainers may be used to hold bolt plate in place during installation if needed

Note: Keep the hardware loose for adjustability.

Note: OE bumper mounting bracket may be loosened for additional adjustability.





Step 15: Connect wire harness

While the bumper is loose and there is room for your hands. Reconnect the sensor and trailer plug wire harness





Installation Instructions: Installation Completion

Step 15: Bumper Alignment

Center rear bumper on vehicle, adjust the gaps before tightening the hardware.

Step 16: Torquing Mounting Hardware

Torque all hardware to manufacturers recommend specifications



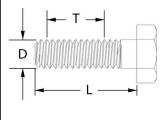
Congratulations your installation is now complete!

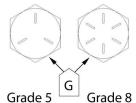


Bolt Torque Specifications

Use this only as a guide for hardware without a called out torque specification in the instruction manual.

Bolt Torque and ID						
Decimal System		Metric System				
	A	ll Torques in Ft.	Lbs. Maxim	nums		
Bolt Size	Grade 5	Grade 8	Bolt Size	Class 9.8	Class 10.9	Class 12.9
5/16	15	20	M6	5	9	12
3/8	30	45	M8	18	23	27
7/16	45	60	M10	32	45	50
1/2	65	90	M12	55	75	90
9/16	95	130	M14	85	120	145
5/8	135	175	M16	130	165	210
3/4	185	280	M18	170	240	290





(No. of Marks +2)

D 10.9

1/2-13x1.75 HHCS

 $\widehat{\mathsf{D}}$ $\widehat{\mathsf{T}}$ $\widehat{\mathsf{L}}$ $\widehat{\mathsf{X}}$

M12-1.25x50 HHCS

G= Grade (Bolt Strength)

D= Nominal Diameter (Inches)

T= Thread Count (Threads per Inch)

L= Length (Inches)

X= Description (Hex Head Cap Screw)

P= Property Class (Bolt Strength)

D= Nominal Diameter (Millimeters)

T= Thread Pitch (Thread Width, mm)

L= Length (Millimeters)

X= Description (Hex Head Cap Screw)



Notes and Disclaimers

Product cleaning and maintenance instructions

Stainless Steel Finish – Aluminum polish may be used to polish small scratches and scuffs on the finish. Mild soap, window or glass cleaner may be used to clean the finish. Dual state powder coat finish – Mild soap, window or glass cleaner may be used to clean the finish. In order to protect the finish, you may wax your product on a regular basis with pure carnauba automotive wax. Do not use any types of soap, polish or was that contains abrasive that could damage the finish. Textured coated finishes should be cleaned with a mild soap on a damp sponge. Do not apply polish or was that requires to be removed by means of buffing. This type of wax is commonly used at car wash facilities. Chrome Finish – Mild soap, window or glass cleaner may be used to clean the finish. In order to protect the finish, you should wax your product on a regular basis with pure carnauba automotive wax. Do not use any types of soap, polish or was that contains abrasive that could damage the finish.

Limited Warranties

Smittybilt's products are covered under the following limited warranties only. Note that the duration of the limited warranty differs according to the material and finish of the product purchased. Subject to the duration and conditions of the limited warranty stated below, Smittybilt warrants to the original retail purchaser that its products are free from defects in material and workmanship. All other warranties and representations express or implied, are hereby disclaimed, including fitness for merchantability and buyer's intended use or purpose. All parts are sold "AS IS" except for the limited warranties granted herein. Buyer assumes all risks as to the selection, suitability and performance of all goods and products selected. This limited warranty does not cover damage or impairment in any part due to misuse, improper installation, accident or contact with on-road or off-road hazards, product modification, improper or inadequate cleaning and/or maintenance. Smittybilt is not responsible for items damaged during shipping. This warranty is not transferable from the original buyer. For the original Buyer to be eligible for the limited warranty coverage, the Buyer must provide proof of purchase. Smittybilt strongly recommends returning the warranty registration card. Customer's remedy hereunder shall be limited only to repair or replacement (at Smittybilt's option) of any defective part(s) returned to Smittybilt at customer's expense. The determination of whether or not a returned part is defective or subject to coverage under the limited warranties stated herein shall be made at Smittybilt's sole discretion. To assure product quality, Smittybilt reserves the right to change product design, material, specification and finishes without prior notice to customers. This limited warranty gives you specific legal rights and you may also have other rights, which may vary from state to state. Some states do not allow limitations on how long an implied warranty lasts, so the above limitations may not apply as to you. Also, some states do not allow the exclusion or limitation of incidental or consequential damages, so the above limitations or exclusions may not apply to you. Smittybilt reserves the right to discontinue product lines and substitute products or provide other remedies than those listed in this limited warranty for those discontinued products.

Warning

Rollover and other types of vehicle accidents may result in serious injury or death to you, your passengers and others sharing the road. Smittybilt accessories are decorative and are not intended to reduce or avoid injury or damage in the event of an accident. The weight and location of Smittybilt accessories may affect your vehicles' handling, stability and performance, creating an increased risk of accident or rollover. Before installing any accessory, check state laws and assure that the accessory will not obscure any lights or interfere with proper operation on your vehicle's safety equipment. Consult your owner's manual and the Smittybilt instructions, or additional safety information. Smittybilt products, nor the warnings contained herein, are not a substitute for your safe driving. Don't drink and drive, always use seat belts and don't drive faster than conditions permit.



