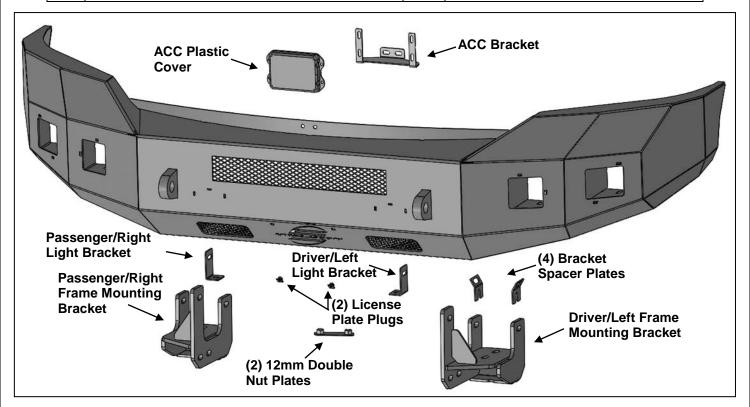


INSTALLATION INSTRUCTIONS

FORTIS FRONT BUMPER 2018 FORD F150

PARTS LIST:

1	Fortis Front Bumper Assembly	20	12mm x 32mm x 3mm Flat Washers
1	Driver/Left Frame Mounting Bracket	12	12mm Lock Washers
1	Passenger/Right Frame Mounting Bracket	8	12-1.75mm Hex Nuts
4	Bracket Spacer Plates	4	8-1.25mm x 25mm Hex Bolts
1	Driver/Left Light Bar "L" Bracket	2	8-1.25mm x 16mm Hex Bolts
1	Passenger/Right Light Bar "L" Bracket	10	8mm x 24mm x 2mm Flat Washers
2	Plastic Plugs for license plate mount	6	8mm Lock Washers
1	Adaptive Cruise Control, ACC, Bracket	4	8mm Hex Nuts
1	ACC Plastic Cover	3	6mm x 25mm Button Head Bolts
2	10mm Rubber Plugs	3	6mm x 18mm x 1.6mm Flat Washers
2	12mm Double Nut Plates	3	6mm Lock Washers
2	12-1.75mm x 170mm Hex Bolts	3	6mm Hex Nuts
10	12-1.75mm x 45mm Hex Bolts	1	Allen Wrench



PROCEDURE:

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

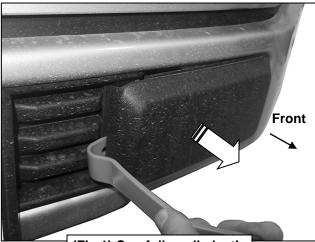
- 1. Remove the license plate and bracket. Release the wiring harness from the clips attached to the back of the bumper. Move all wiring harnesses away from bumper.
- 2. Next, remove the plastic bumper pad assembly, **(Figure 1)**. **NOTE**: Carefully pull bumper pad straight out away from bumper. Unplug and remove the adaptive cruise control, if equipped.
- 3. Place blocks or jack stands under the front bumper to support it during mounting bolt removal. Once the bumper has been safely supported, remove the large hex nut from the back of the bumper bracket attaching the lower bumper to the bumper bracket, (Figure 2). Next, from the front of the bumper, remove the (2) factory hex nuts attaching the bumper to the bumper brackets, (Figure 3). WARNING! Assistance is required to hold the bumper in place during bolt removal to prevent the bumper from falling. Carefully slide the bumper off over the tow hooks.

- **4.** Remove the passenger side tow hook and plastic cover, (if equipped), from the bottom of the frame, **(Figure 4)**. Repeat to remove the driver side tow hook if equipped.
- 5. Next, select the passenger side Frame Mounting Bracket. Slide the Bracket over the end of the frame. Insert (1) 12mm x 170mm Long Hex Bolt with (1) 12mm Flat Washer through the outside of the mounting tab on the Frame Bracket, through the frame and the inner mounting tab. Secure with (1) 12mm Flat Washer, (1) 12mm Lock Washer and (1) 12mm Hex Nut. Insert (1) Spacer Plate down between each mounting tab and the side of the frame, (Figures 5—7). Do not fully tighten hardware.
- 6. Insert (1) 12mm Double Nut Plate into the open end of the frame, (Figure 7). Attach the Frame Bracket to the bottom of the frame and the Double Nut Plate with (2) 12mm x 45mm Hex Bolts, (2) 12mm Lock Washers and (2) 12mm Flat Washers, (Figure 7). NOTE: On models with tow hooks, reuse the factory nut plate and hardware to install the Frame Bracket. Leave hardware loose at this time.
- 7. Repeat **Steps 5 & 6** to install the driver side Frame Bracket assembly.
- **8.** Determine if the vehicle is equipped with an adaptive cruise control, (ACC). **Vehicles without ACC**, continue to **Step 9**.
 - a. Select the ACC Plastic Cover and the ACC Support Bracket, (**Figure 8**). Insert (3) 6mm x 25mm Button Head Bolts through the (3) holes on the Plastic Cover, the Bracket and out through the adaptive cruise control. Secure with (3) 6mm Flat Washers, (3) 6mm Lock Washers and (3) 6mm Hex Nuts, (**Figure 8**). **NOTE:** To prevent the Plastic Cover from tearing, do not over tighten Bolts.
 - **b.** On some Bumpers, drilling may be required on front trim of Bumper. Select the ACC Bracket. Align the Bracket up against the center of the front trim on the Bumper, **(Figure 9)**. Mark through the center of the slots on the Bracket and onto the Bumper trim. Use a 5/16" drill bit to drill out (2) holes through the Bumper front trim, **(Figure 9)**. **NOTE:** Do not drill through the edges of the Bumper trim.
 - **c.** Attach the ACC assembly to the front of the bumper using (2) 8mm x 25mm Hex Bolts, (4) 8mm Flat Washers, (2) 8mm Lock Washers and (2) 8mm Hex Nuts, **(Figure 10)**.
 - d. Tighten all ACC hardware and continue to Step 9.
- **9.** Center LED light installation as supplied with bumper or sold separately.
 - a. Select the L/R "L" Brackets, (Figure 11). Attach the Brackets to the top of the (2) mounting tabs welded onto the back of the bumper with the included 8mm x 25mm Hex Bolts, (4) 8mm Flat Washers, (2) 8mm Lock Washers and (2) 8mm Hex Nuts. Leave loose at this time.
 - b. Attach the LED light assembly to the "L" Brackets with the included (2) 8mm x 16mm Hex Bolts, (2) 8mm Lock Washers and (2) 8mm Flat Washers. Do not fully tighten hardware at this time. IMPORTANT: "L" Brackets are designed for 8mm light mounting hardware only. Modify "L" Brackets if necessary or use brackets supplied by your light manufacturer if possible to install hardware larger than 8mm.
 - **c.** Follow light manufacturer's instructions to properly wire the light.
- **10. LED light installation at ends of bumper** (sold separately).
 - **a.** Insert light into opening and up to mounting slot.
 - **b.** Follow the light manufacturer's instructions to attach light. **NOTE**: On two light systems, attach the flood light to the outer slot and the spot light to the inner slot.
 - **c.** Repeat the above steps for passenger side light installation.
 - **d.** Follow light manufacturer's instructions to properly wire the light.
- **11.** With assistance, position the Bumper Assembly onto the outsides of the Frame Brackets. 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.
- **12.** Attach the Bumper to the Brackets with the included (6) 12mm x 45mm Hex Bolts, (12) 12mm Flat Washers, (6) 12mm Lock Washers and (6) 12mm Hex Nuts, **(Figures 12—14)**. Snug but do not tighten.
- **13.** Level and adjust the bumper and fully tighten all 12mm hardware to 65-70ft-lbs. **NOTE**: Tighten the (4) Hex Bolts attaching the Frame Brackets to the bottom of the frame and Double Nut Plate first. If additional in-out adjustment is required, loosen Frame Bracket Hardware, slide the Bracket in or out as necessary and fully tighten all hardware starting with the bottom Bracket to frame hardware.
- **14.** Use the included (2) push-in plastic nuts to attach the front license plate, (if required), to the (2) holes in the front bumper, **(Figure 15)**.
- 15. Do periodic inspections to the installation to make sure that all hardware is secure and tight.

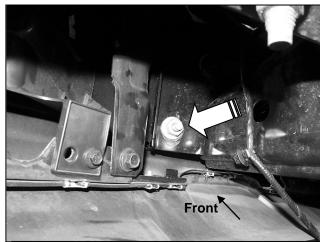
FORTIS FRONT BUMPER 2018 FORD F150

To protect your investment, wax this product after installing. Regular waxing is recommended to add a protective layer over the finish. 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 Front Bumper assembly.

Passenger/right Side Installation Pictured



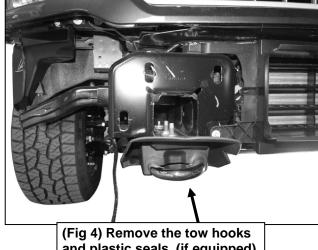
(Fig 1) Carefully pull plastic bumper pad off of bumper



(Fig 2) Remove factory hex nut (arrow) from back of bumper bracket (Driver side pictured)

(Fig 3) Remove (2) factory hex nuts from each side

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



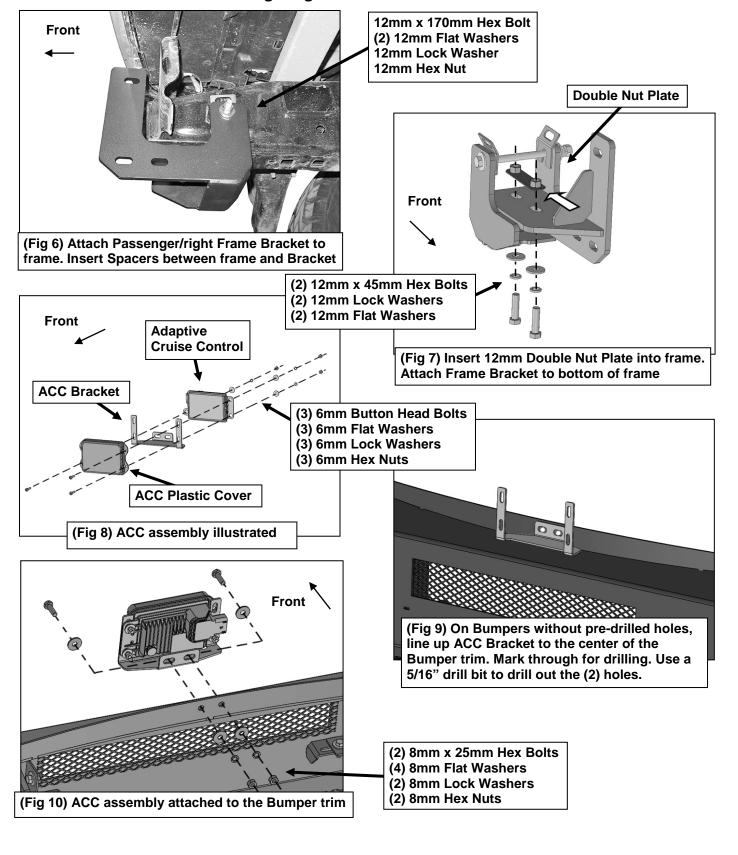
and plastic seals, (if equipped)

(2) Spacer Plates **Front**

(Fig 5) Attach Passenger/right Frame Bracket to frame. Insert Spacers between frame and Bracket

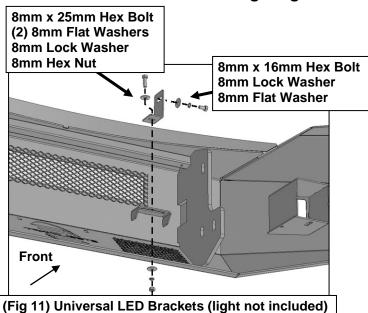
12mm x 170mm Hex Bolt (2) 12mm Flat Washers 12mm Lock Washer 12mm Hex Nut

Passenger/right Side Installation Pictured

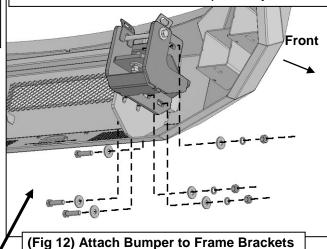


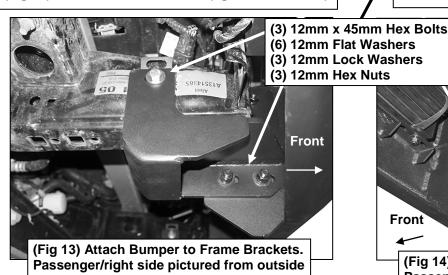
FORTIS FRONT BUMPER 2018 FORD F150

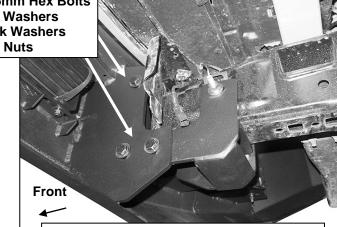
Passenger/right Side Installation Pictured



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







(Fig 14) Attach Bumper to Frame Brackets. Passenger/right side pictured from below

