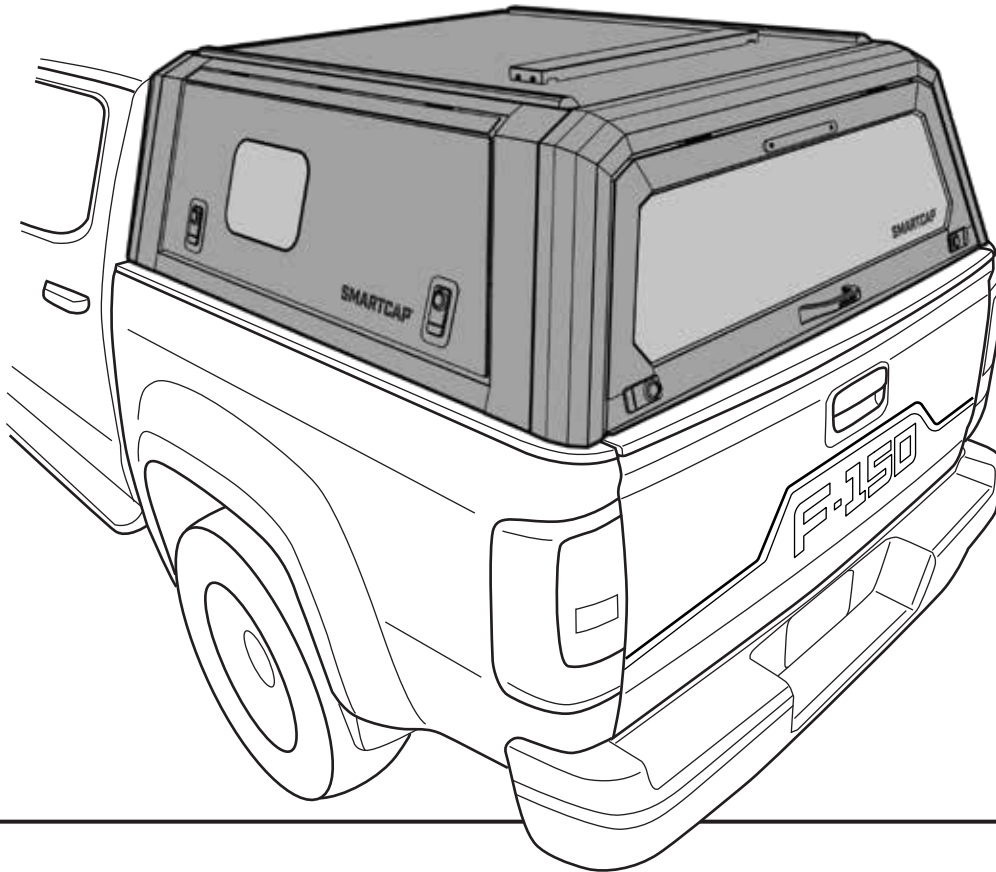


**SMARTCAP®**

# **INSTRUCTION GUIDE**

## **FORD F-150 EDITION**

### **2024-CURRENT (4TH GENERATION)**



- ▼ **PREPARE A CLEAN WORK AREA.**
- ▼ **WE RECOMMEND A MINIMUM OF 2 PEOPLE FOR ASSEMBLY.**
- ▼ **ENSURE THE REQUIRED TOOLS ARE PRESENT AND ALL HARDWARE CONTENTS ARE ACCOUNTED FOR.**
- ▼ **NEVER USE ACETONE OR THINNERS ON PAINTED PARTS.**
- ▼ **READ THROUGH THE ENTIRE INSTRUCTION GUIDE BEFORE STARTING THIS PROCEDURE AND FOLLOW THE STEPS CAREFULLY TO AVOID ANY DAMAGE TO THE COMPONENTS OR THE VEHICLE.**

**SMARTCAP.COM**

SUPPORT.NA@SMARTCAP.COM - NORTH AMERICA  
SUPPORT.SA@SMARTCAP.COM - REST OF WORLD



I-SHEET-NA-F3

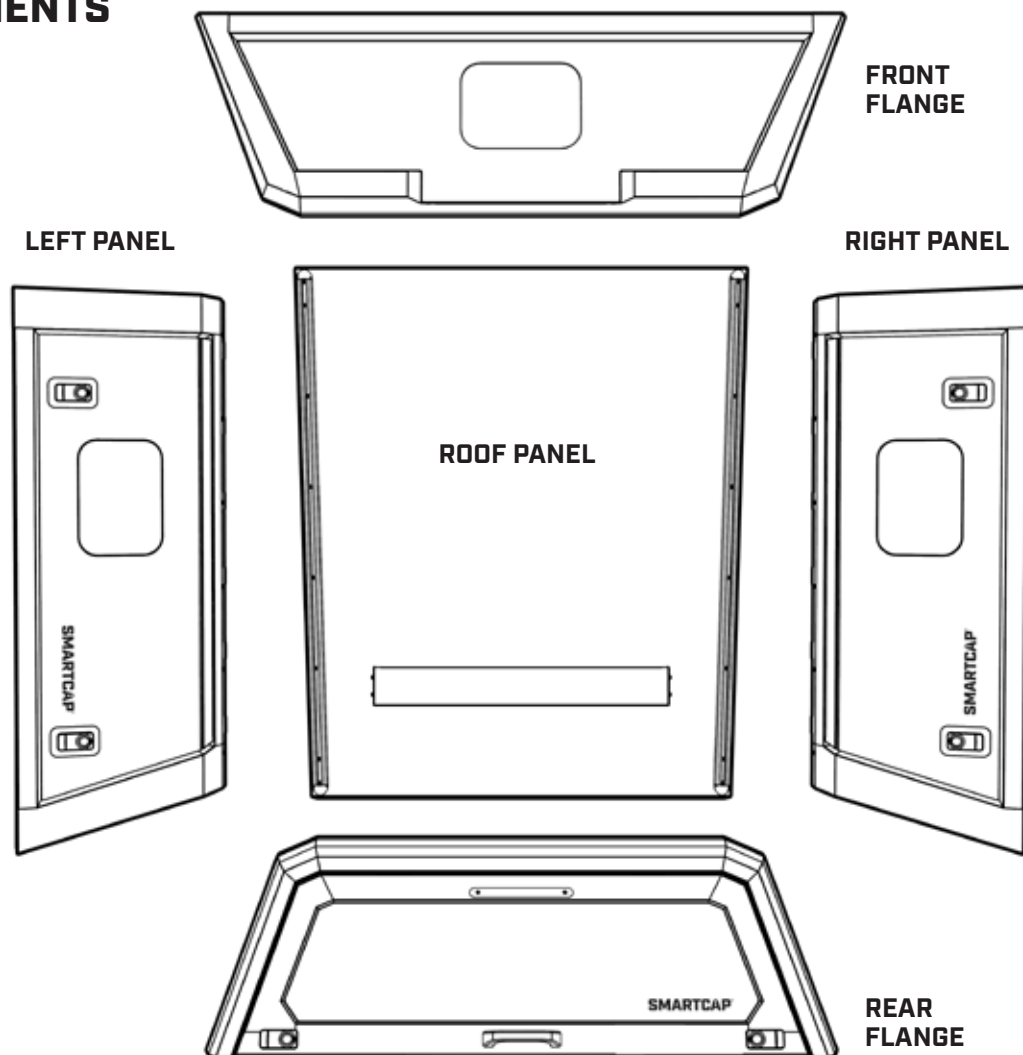
## TOOLS REQUIRED



## IMPORTANT

- ▼ USE ONLY THE TOOLS RECOMMENDED ABOVE.
- ▼ USE ONLY THE HARDWARE PROVIDED IN THIS KIT.
- ▼ ASSISTANCE WILL BE NEEDED FOR THIS INSTALLATION.  
FOUR PEOPLE ARE RECOMMENDED TO LIFT THE SMARTCAP ONTO THE VEHICLE.
- ▼ AVOID PINCHING OR CRUSHING HANDS AND FINGERS.
- ▼ INSPECT ALL KIT COMPONENTS FOR DAMAGE BEFORE ASSEMBLY.
- ▼ NEVER USE ACETONE OR THINNERS ON PAINTED PARTS.

## COMPONENTS

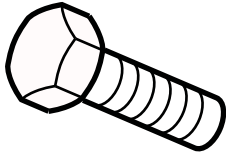


I-SHEET-NA-F3

# ASSEMBLY HARDWARE

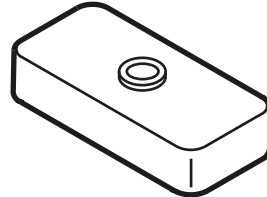
## FITMENT KIT

**M6 BOLT**



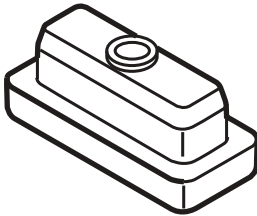
**30X**

**FASTENER  
BLOCK CLAMP**



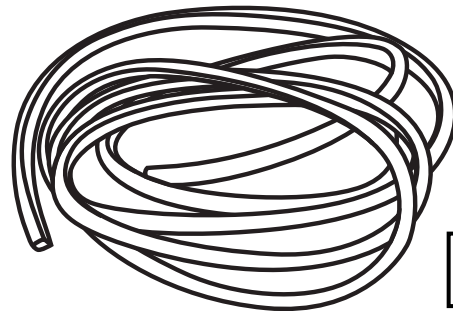
**30X**

**FASTENER  
BLOCK**



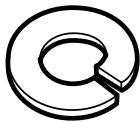
**30X**

**D - RUBBER**



**1X**

**M6 LOCK  
WASHER**



**30X**

## PRE-FASTENED TO ROOF PANEL

**M6 FENDER  
WASHER**



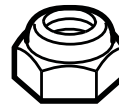
**12X**

**SHORT BED**

**14X**

**STANDARD BED**

**M6 LOCK  
NUT**



**12X**

**SHORT BED**

**14X**

**STANDARD BED**

# STEP 1

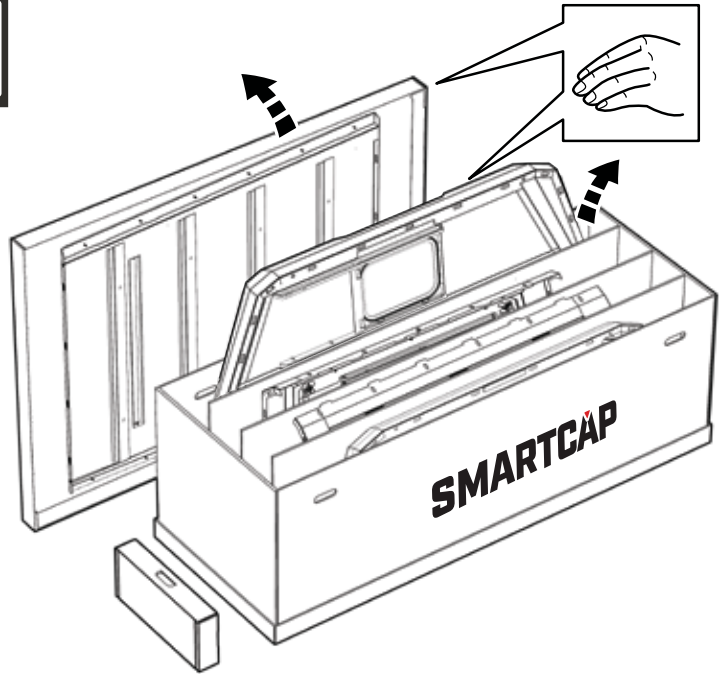


**IMPORTANT**

2 PERSON JOB



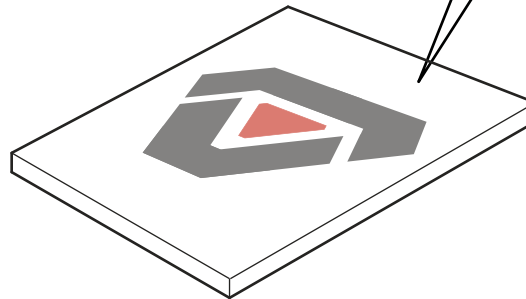
- ▼ BE SURE TO REMOVE ALL FIVE PANELS FROM THEIR PACKAGING AND INSPECT THE PAINTED SURFACES PRIOR TO ASSEMBLY, AS SMARTCAP WILL NOT ACCEPT WARRANTY CLAIMS AFTER ASSEMBLY IS COMPLETED. IF MANUFACTURING IMPERFECTIONS OR SHIPPING DAMAGES ARE FOUND, DO NOT CONTINUE WITH THE ASSEMBLY PROCESS AND CONTACT [SUPPORT.NA@SMARTCAP.COM](mailto:SUPPORT.NA@SMARTCAP.COM).



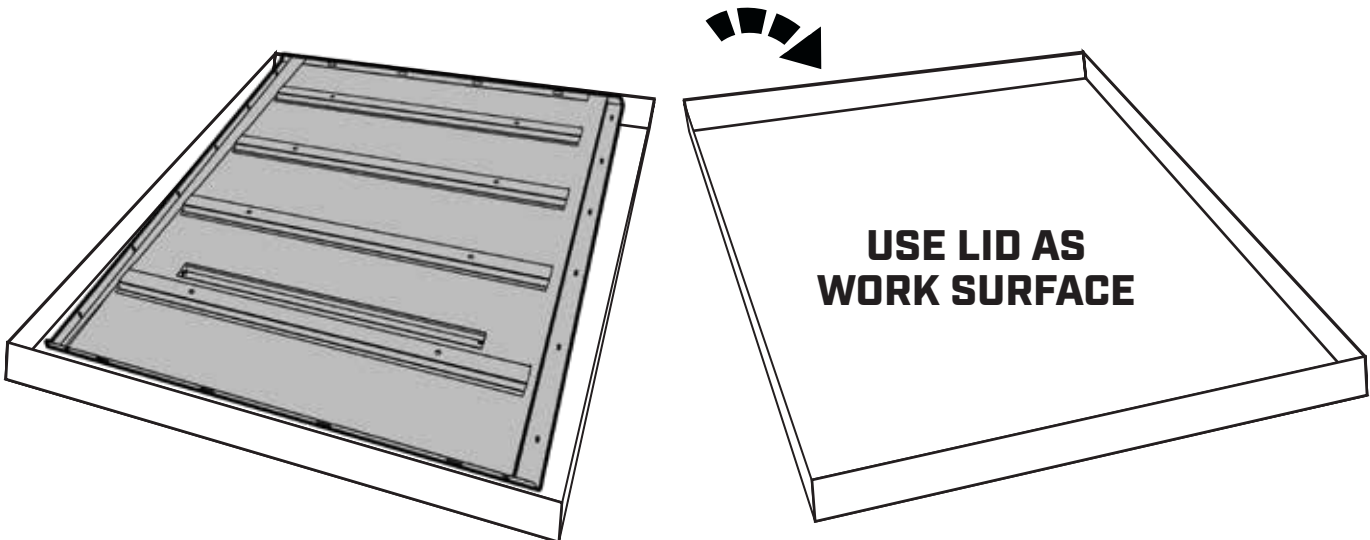
# STEP 2

PLACE THE ROOF PANEL WHERE YOU PLAN TO ASSEMBLE THE CAP. REMOVE THE LID FROM THE PACKAGING AND PLACE IT NEXT TO THE ROOF PANEL.

**LOGO SIDE UP**



**USE LID AS WORK SURFACE**

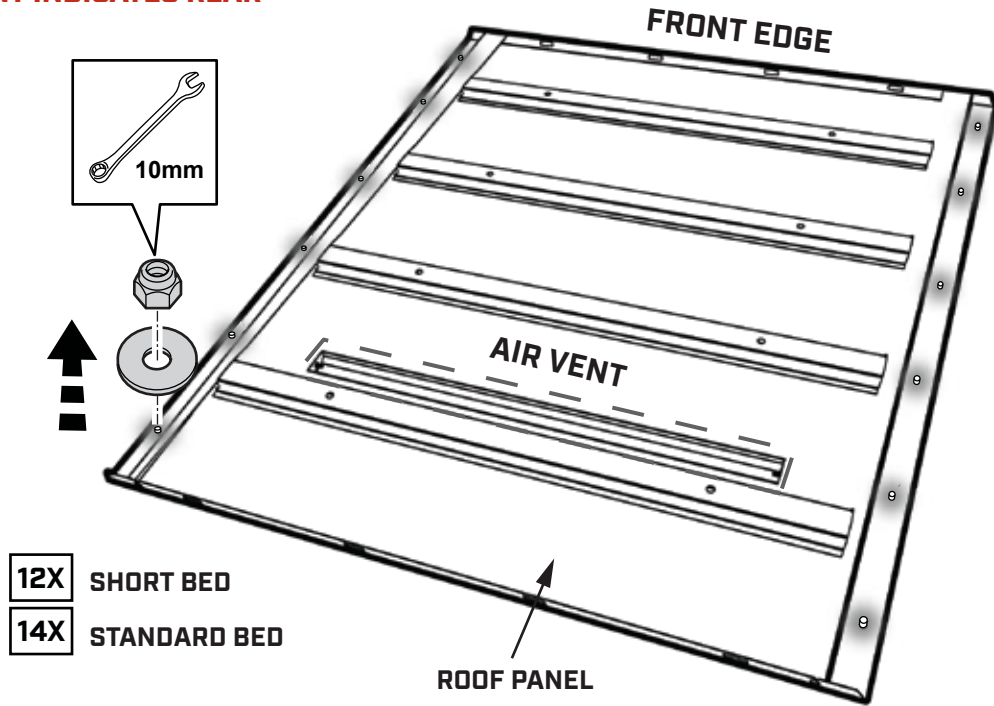


# STEP 3

USE A 10MM COMBINATION WRENCH TO REMOVE ALL HARDWARE FROM THE ROOF PANEL AND SAVE FOR REUSE.



**AIR VENT INDICATES REAR**



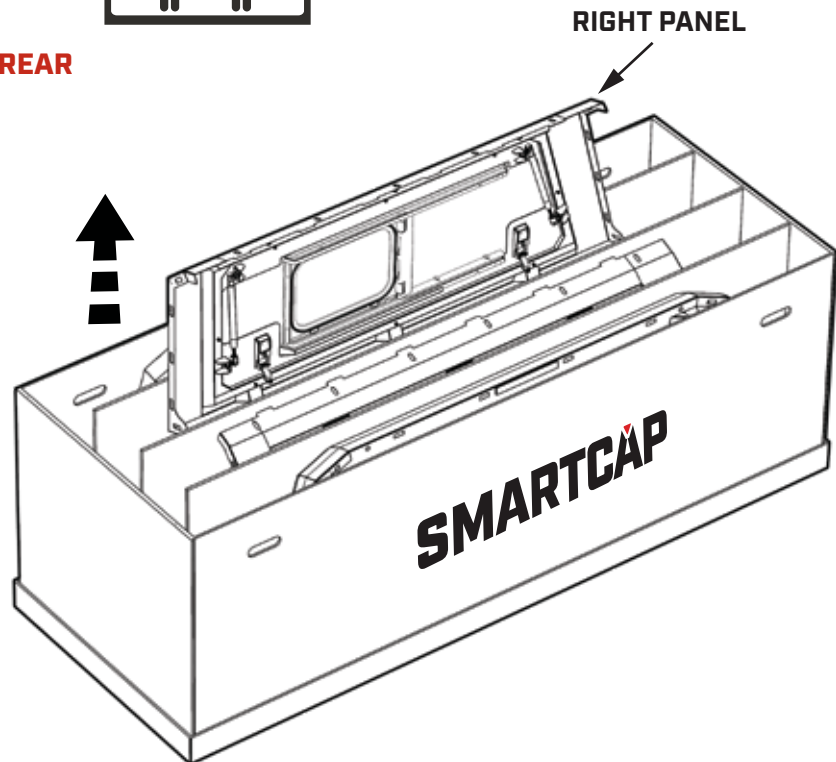
# STEP 4

LOCATE THE RIGHT PANEL IN THE SMARTCAP PACKAGE AND BRING IT TO YOUR WORK AREA.

2 PERSON JOB



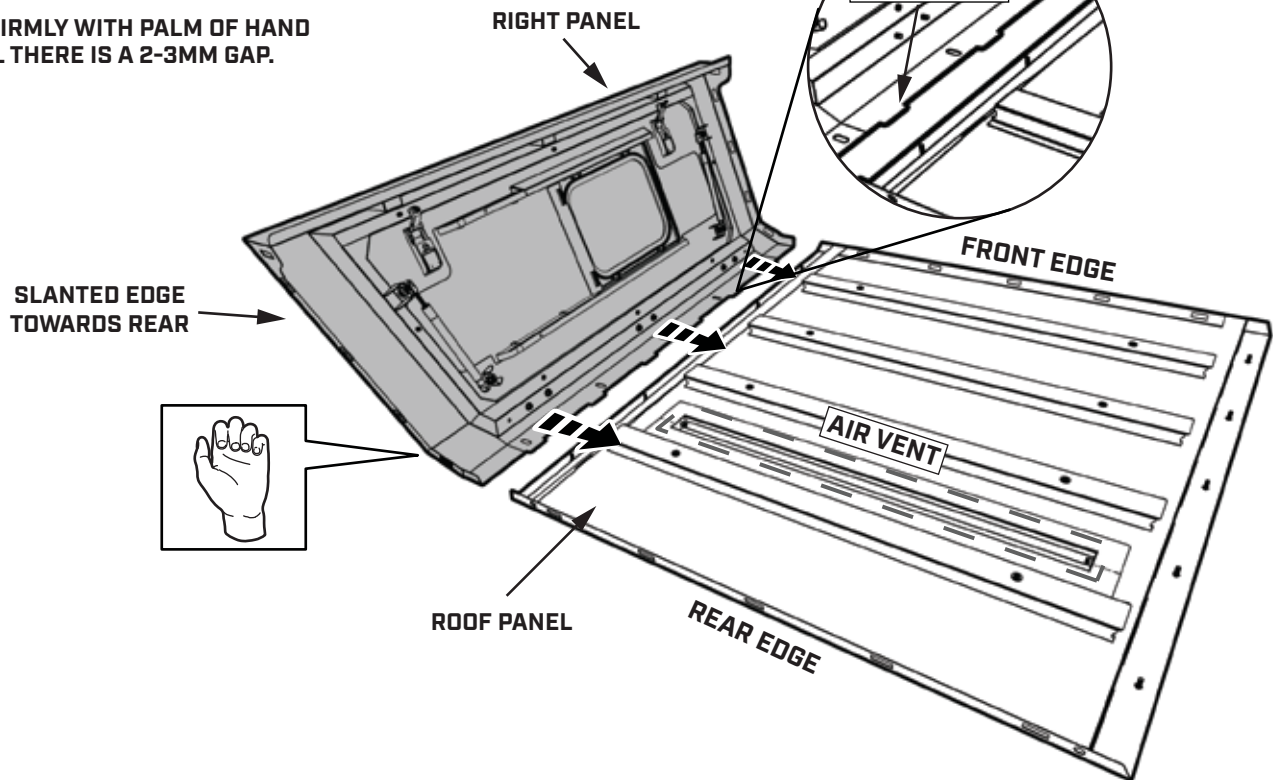
**SLANTED EDGE INDICATES REAR**



# STEP 5

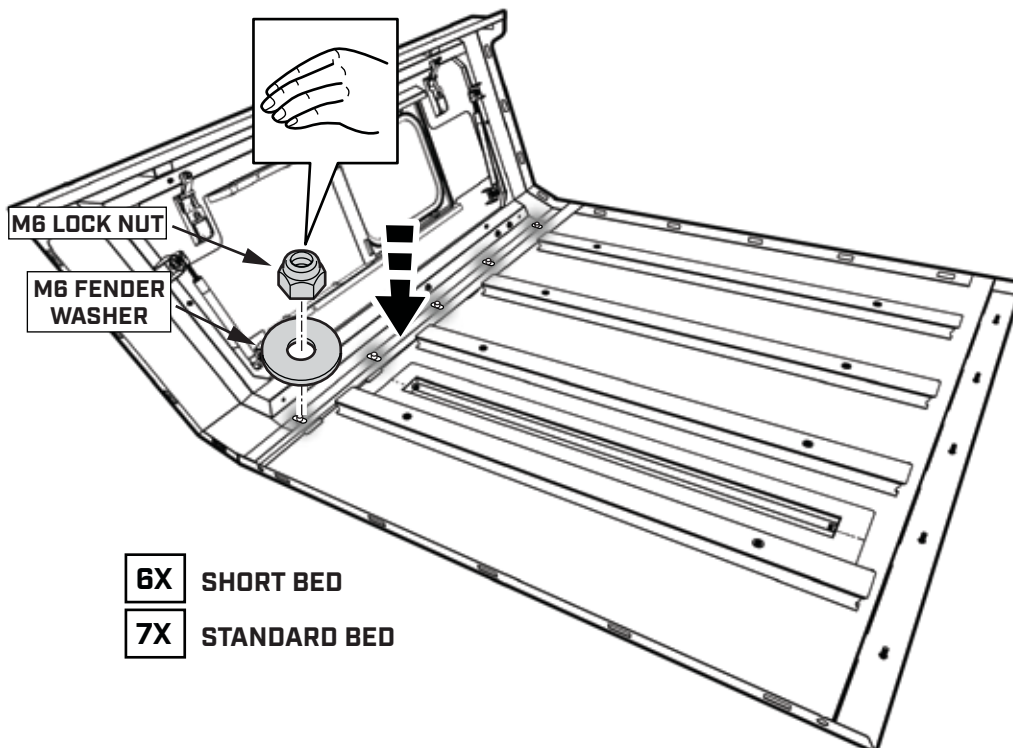
INSERT PANEL TABS INTO NARROW SLOTS JUST ABOVE FOAM PADDING ON ROOF PANEL.

TAP FIRMLY WITH PALM OF HAND UNTIL THERE IS A 2-3MM GAP.



# STEP 6

HAND TIGHTEN M6 LOCK NUT WITH M6 FENDER WASHER TO ALL BOLTS.

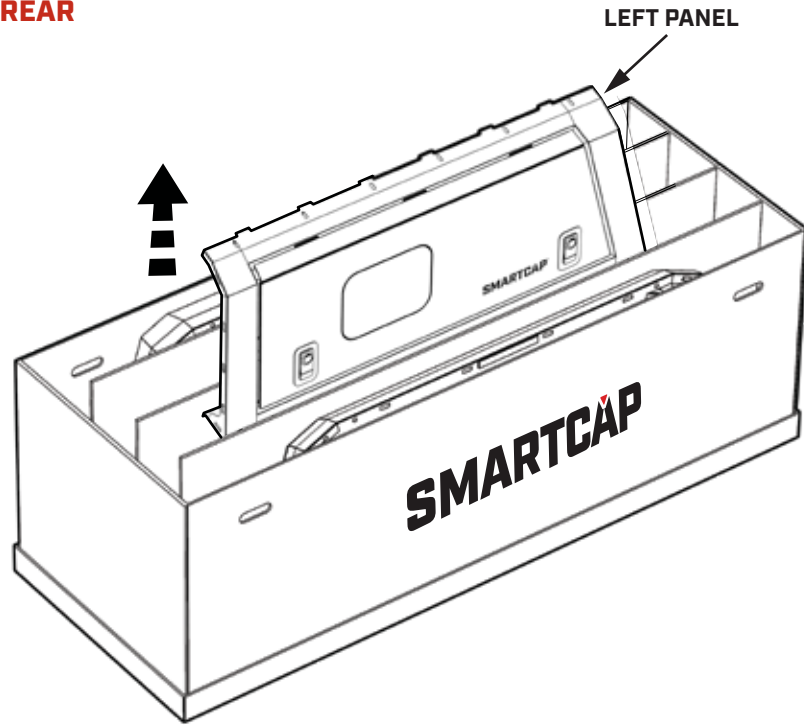


# STEP 7

LOCATE THE LEFT PANEL IN THE SMARTCAP PACKAGE AND BRING IT TO YOUR WORK AREA.



**SLANTED EDGE INDICATES REAR**

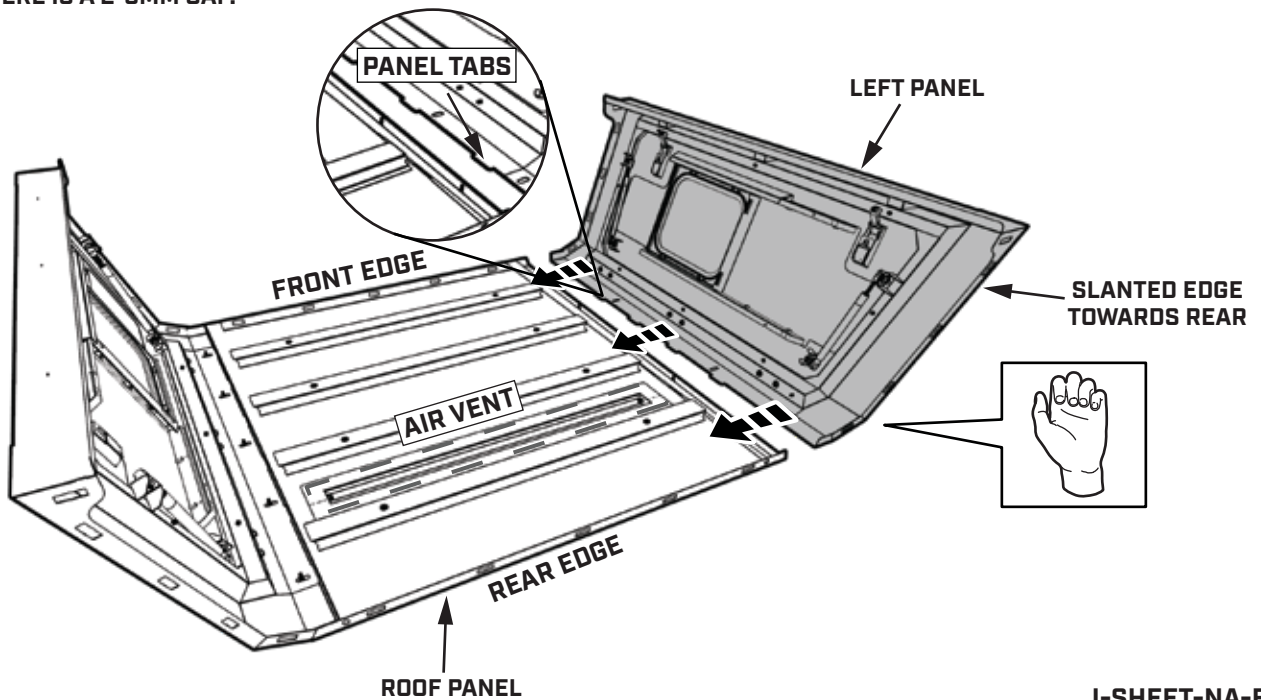


# STEP 8

INSERT PANEL TABS INTO NARROW SLOTS JUST ABOVE FOAM PADDING ON ROOF PANEL.



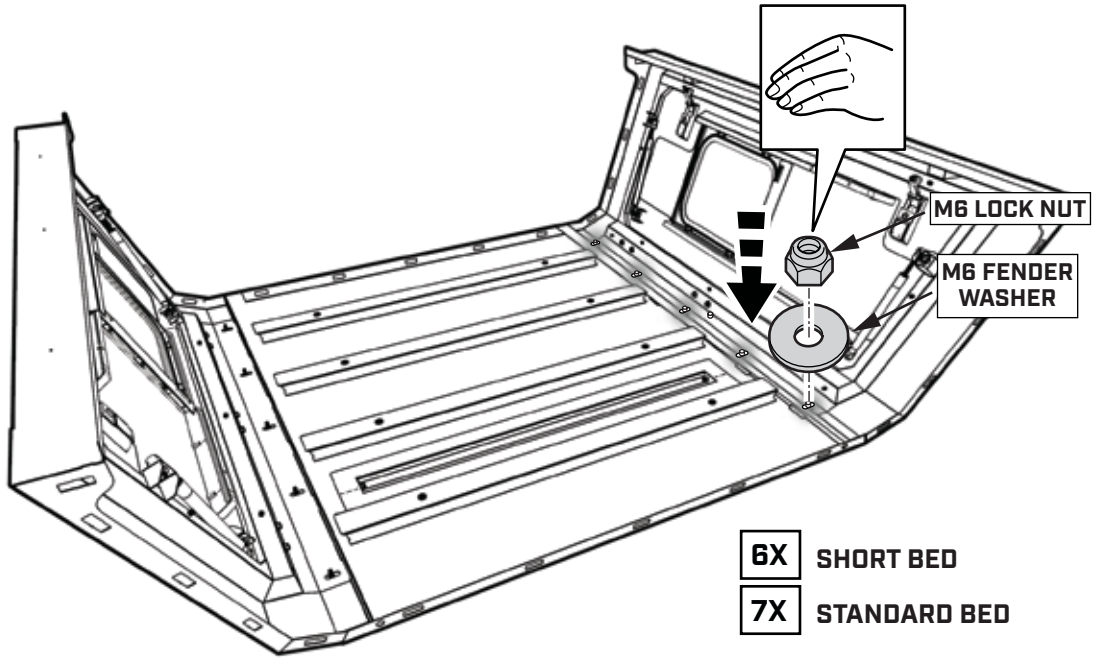
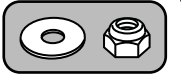
TAP FIRMLY WITH PALM OF HAND UNTIL THERE IS A 2-3MM GAP.



I-SHEET-NA-F3

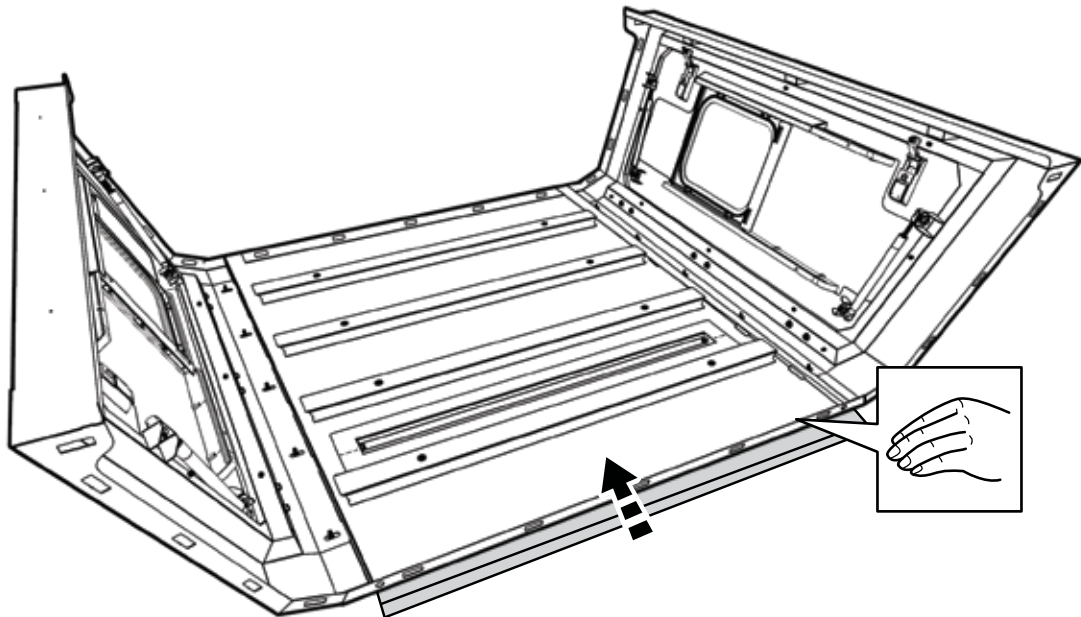
# STEP 9

HAND TIGHTEN M6 LOCK NUT WITH M6 FENDER WASHER TO ALL BOLTS.



# STEP 10

PUSH THE SMARTCAP TO EXPOSE A FEW INCHES OF STYROFOAM UNDERNEATH THE ROOF PANEL TO PROVIDE SUPPORT FOR THE FRONT FLANGE.

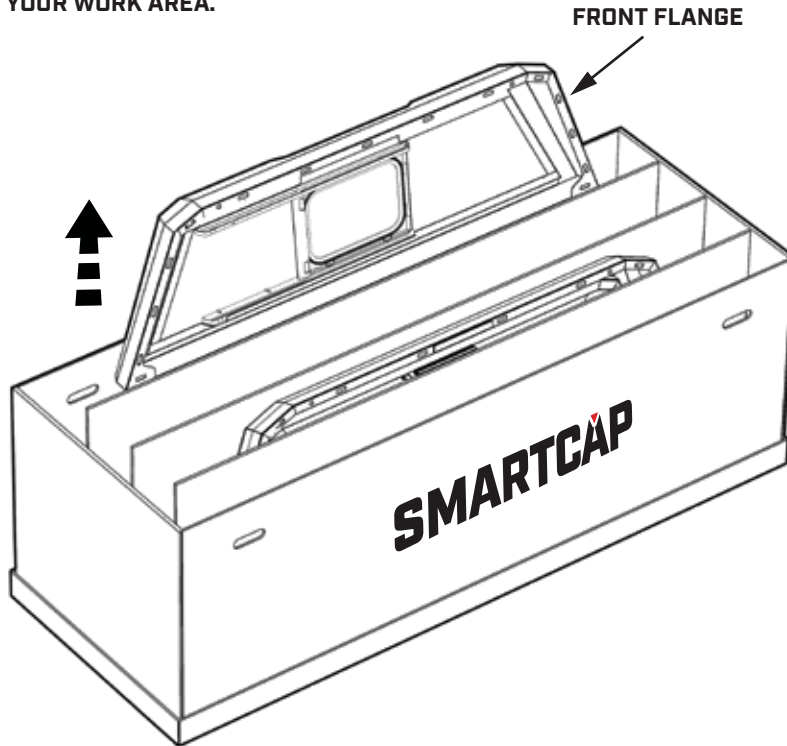
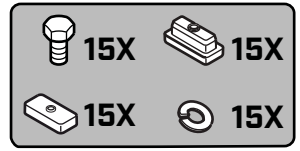




# STEP 11

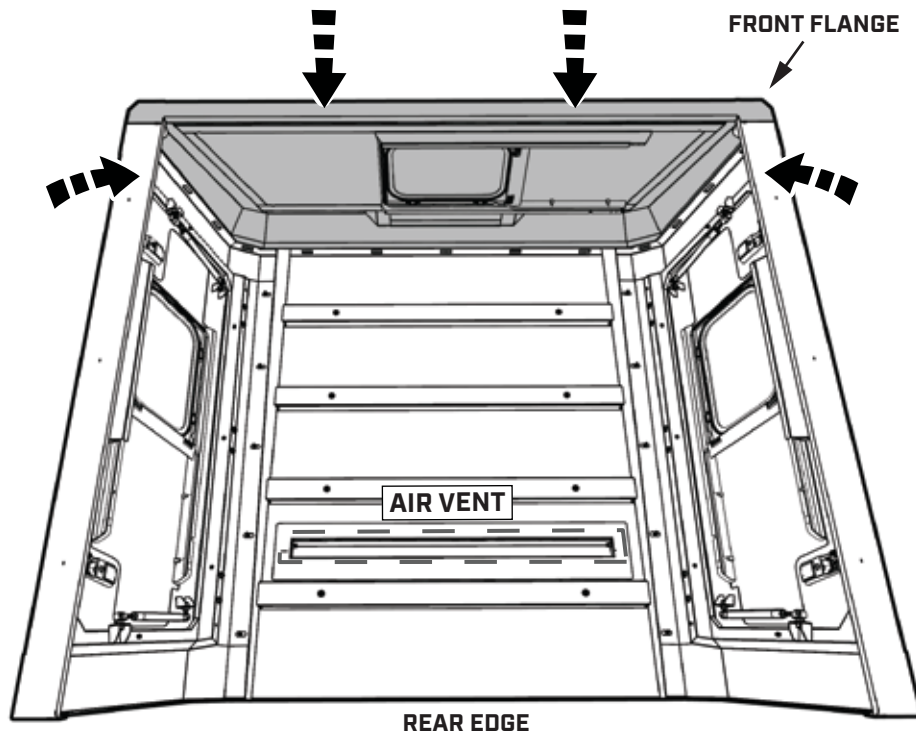
RETRIEVE THE NECESSARY HARDWARE FROM THE FITMENT KIT.

LOCATE THE FRONT FLANGE IN THE SMARTCAP PACKAGE AND BRING IT TO YOUR WORK AREA.



# STEP 12

PLACE FRONT FLANGE AS SHOWN BELOW.



I-SHEET-NA-F3

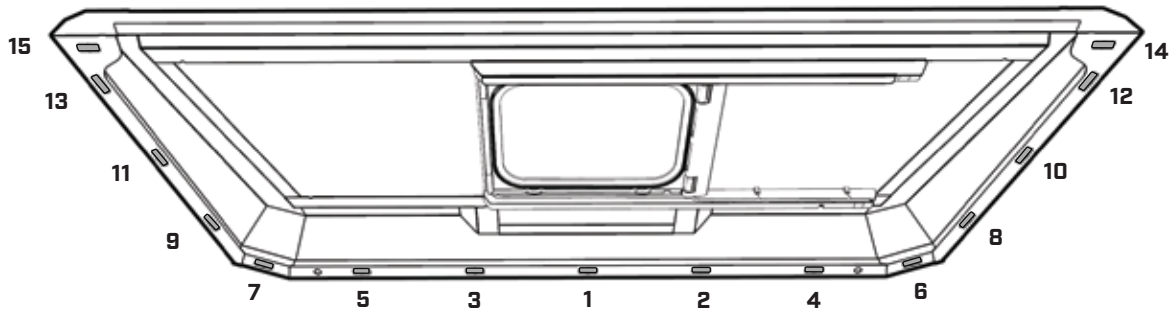
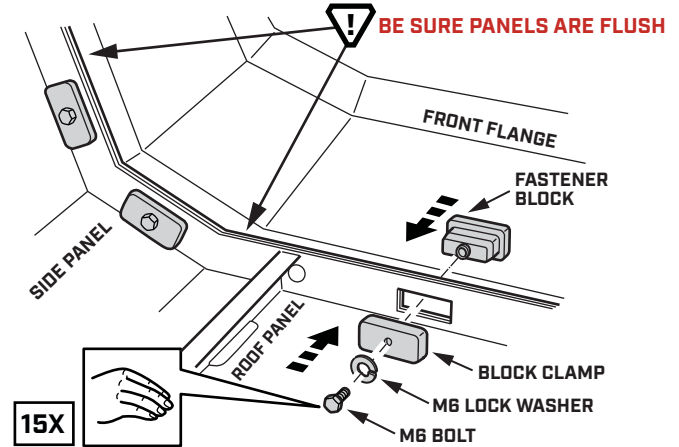
# STEP 13

INSTALL HARDWARE ALONG FRONT FLANGE WITH M6 BOLT ON INSIDE.

START WITH ASSEMBLING FASTENER BLOCKS 1-5.

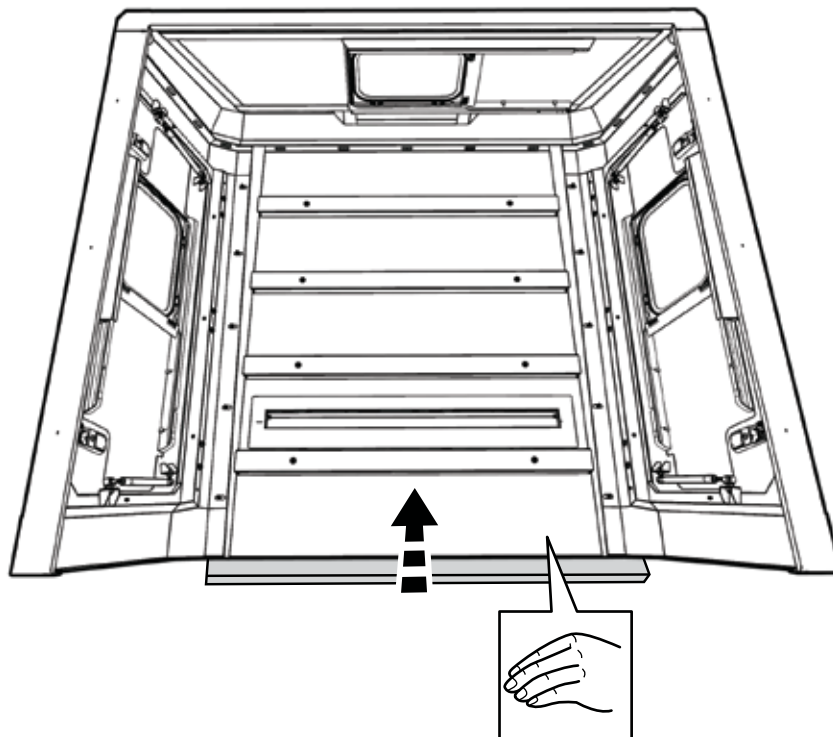
ADJUST LEFT AND RIGHT PANELS TO ALIGN FASTENER BLOCKS 6-15 FOR ASSEMBLY.

HAND TIGHTEN IN THE SEQUENCE SHOWN.



# STEP 14

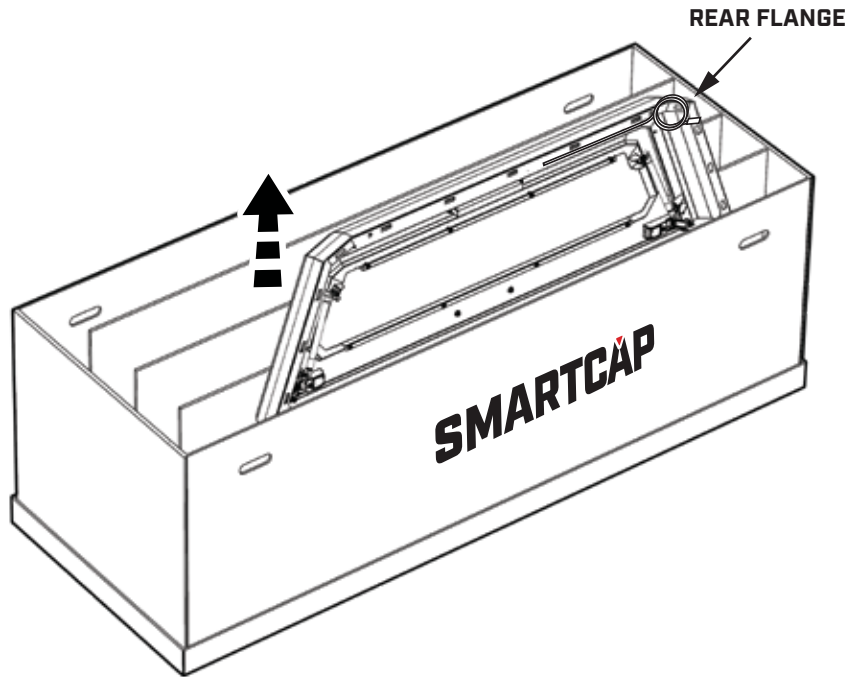
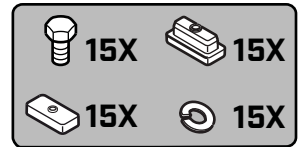
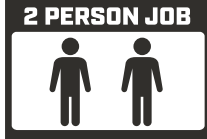
PUSH THE SMARTCAP TO EXPOSE A FEW INCHES OF STYROFOAM UNDERNEATH THE ROOF PANEL TO PROVIDE SUPPORT FOR THE REAR FLANGE.



# STEP 15

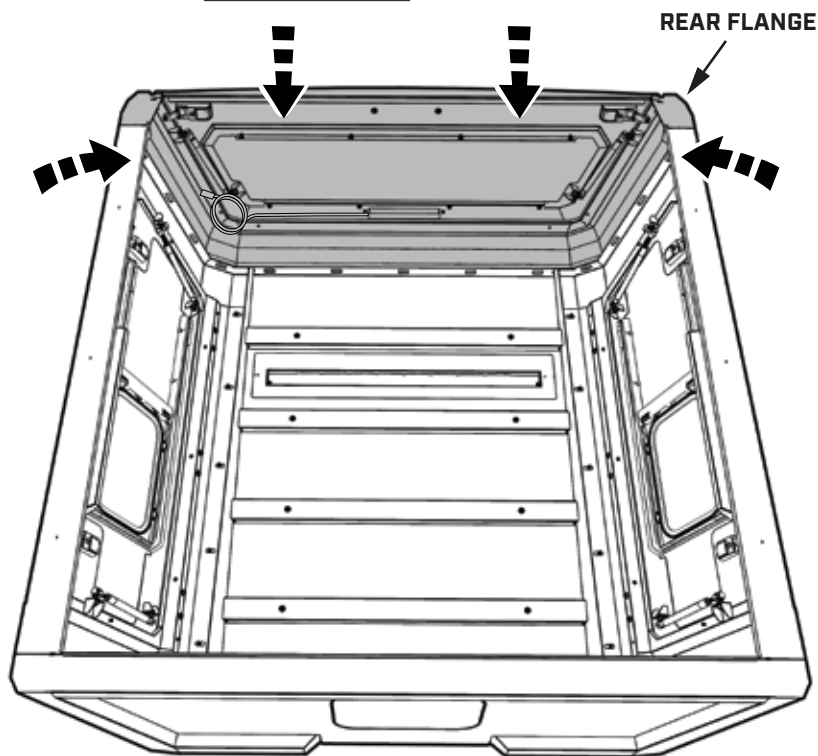
RETRIEVE THE NECESSARY HARDWARE FROM THE FITMENT KIT.

LOCATE THE REAR FLANGE IN THE SMARTCAP PACKAGE AND BRING IT TO YOUR WORK AREA.



# STEP 16

PLACE REAR FLANGE AS SHOWN BELOW.



I-SHEET-NA-F3

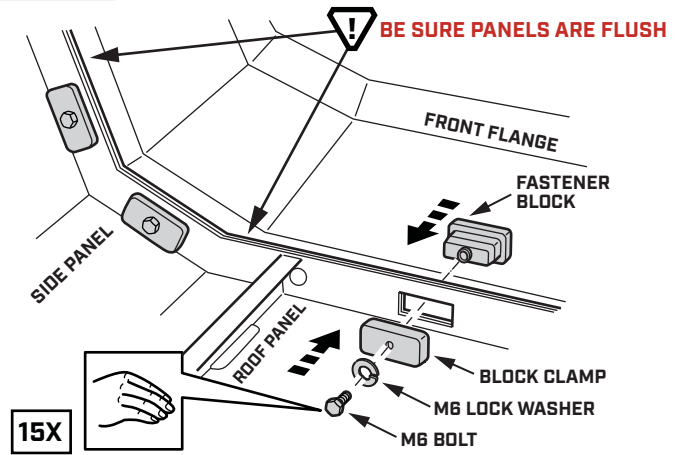
# STEP 17

INSTALL HARDWARE ALONG REAR FLANGE WITH BOLT ON INSIDE.

START WITH ASSEMBLING FASTENER BLOCKS 1-5.

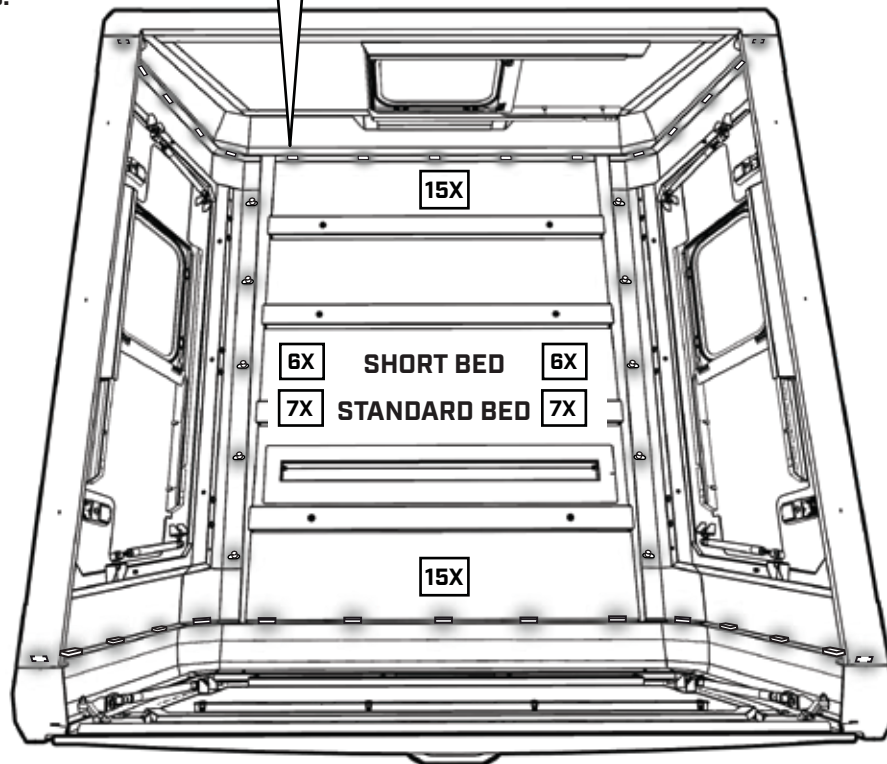
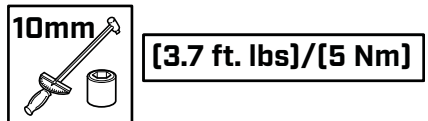
ADJUST LEFT AND RIGHT PANELS TO ALIGN FASTENER BLOCKS 6-15 FOR ASSEMBLY.

HAND TIGHTEN IN THE SEQUENCE SHOWN.



# STEP 18

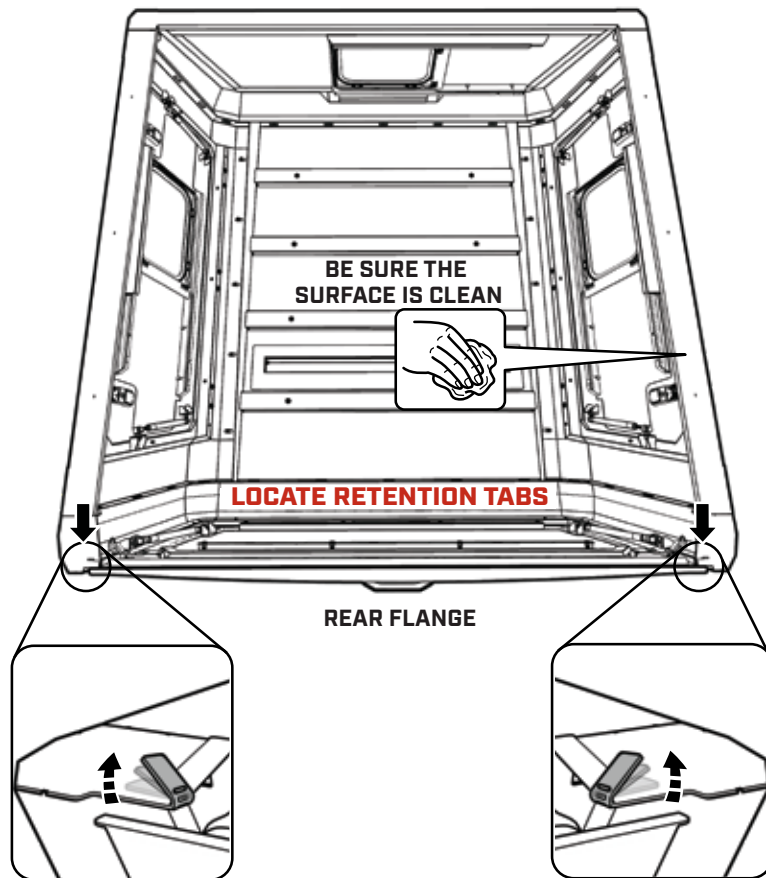
TIGHTEN ALL HARDWARE WITH TORQUE WRENCH AND 10MM SOCKET TO 3.7 FT. LBS. [5 NEWTON METERS]



## STEP 19

ENSURE THE ENTIRE BOTTOM EDGE OF THE SMARTCAP IS CLEAN.

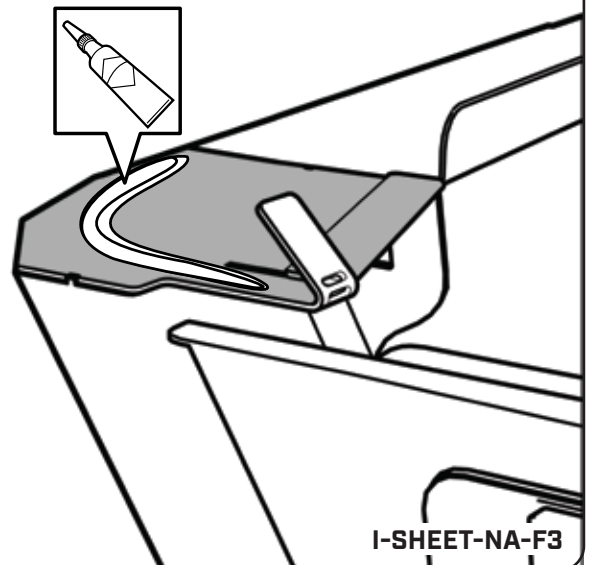
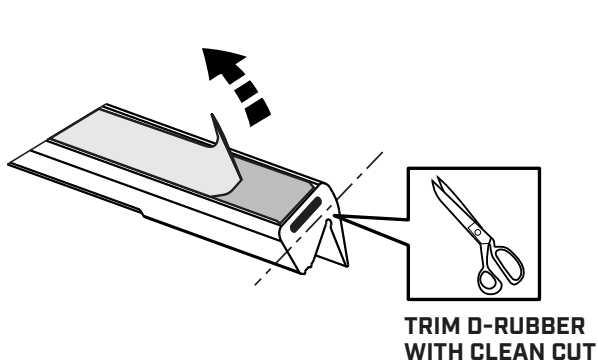
LOCATE BOTH RETENTION TABS ON THE REAR FLANGE AND BEND EACH TO A 45-DEGREE ANGLE FOR D-RUBBER FITMENT.



## STEP 20

TRIM THE D-RUBBER WITH A CLEAN, STRAIGHT CUT.

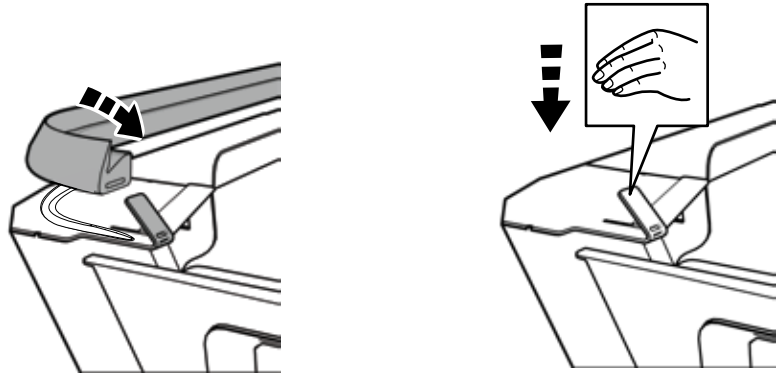
APPLY 2-3 INCHES OF GEL SUPER GLUE NEAR THE RETENTION TABS, ALONG THE BOTTOM EDGE OF THE REAR FLANGE



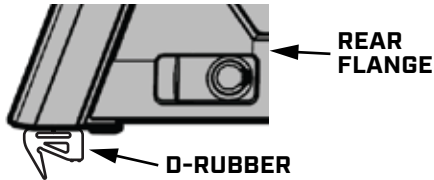
## STEP 21

FULLY INSERT THE RETENTION TAB INTO THE SLOT ON THE D-RUBBER. ENSURE THE D-RUBBER IS ORIENTED CORRECTLY WITH ITS PROFILE MATCHING THE CONTOUR OF THE REAR FLANGE.

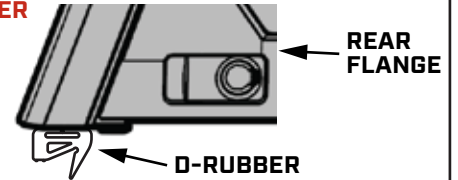
PRESS DOWN FIRMLY ON THE TAB AND THE D-RUBBER TO BOND IT TO THE REAR FLANGE, CREATING A TIGHT SEAL.



**CORRECT D-RUBBER ORIENTATION**



**INCORRECT D-RUBBER ORIENTATION**

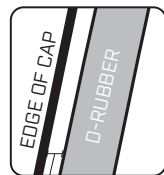


## STEP 22

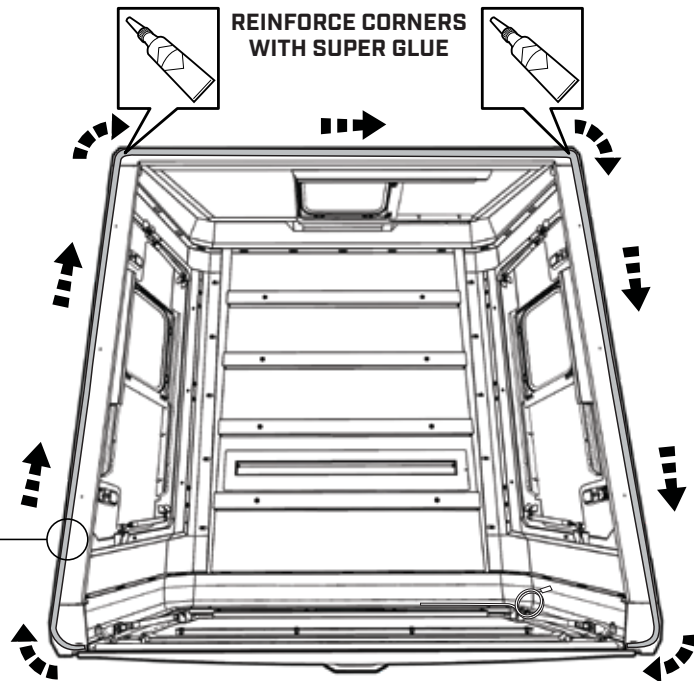
ALIGN THE D-RUBBER ALONG THE SMARTCAP'S EDGE, MAINTAINING A CONSISTENT 1/8 INCH GAP FROM THE EDGE.

START FROM ONE CORNER AND WORK YOUR WAY AROUND THE CAP TO ENSURE PROPER PLACEMENT AND ALIGNMENT.

APPLY 2-3 INCHES OF GEL SUPER GLUE AT THE FRONT CORNERS OF THE SMARTCAP, ALONG THE BOTTOM EDGE OF THE FRONT FLANGE.



1/8 INCH FROM EDGE

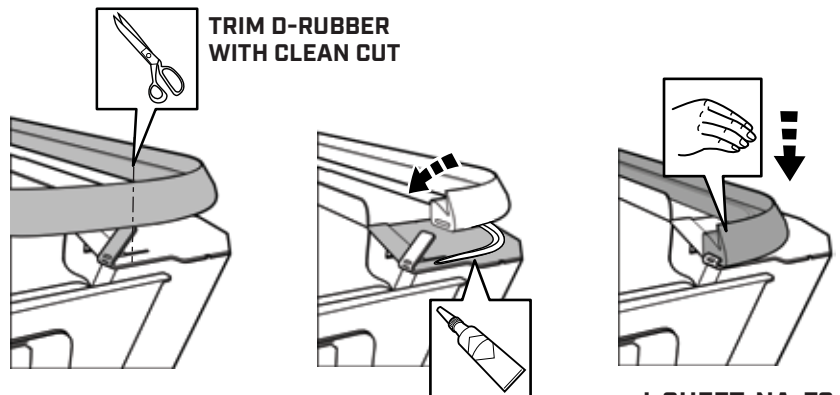


## STEP 23

TRIM ANY EXCESS D-RUBBER BEYOND THE EDGE FOR A NEAT FINISH.

APPLY 2-3 INCHES OF GEL SUPER GLUE NEAR THE RETENTION TAB, ALONG THE BOTTOM EDGE OF THE REAR FLANGE. FULLY INSERT THE RETENTION TAB INTO THE SLOT ON THE D-RUBBER.

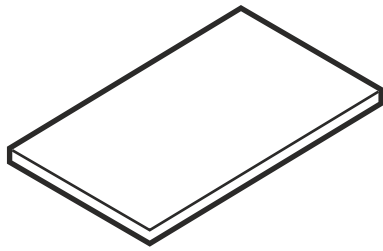
PRESS DOWN FIRMLY ON THE TAB AND THE D-RUBBER TO BOND IT TO THE REAR FLANGE, CREATING A TIGHT SEAL.



I-SHEET-NA-F3

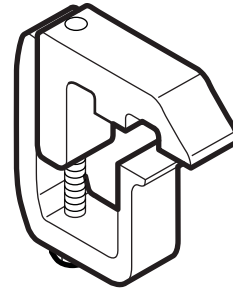
## INSTALLATION HARDWARE

### THIN RUBBER PAD



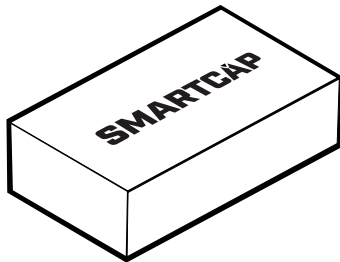
6X

### MOUNTING CLAMP



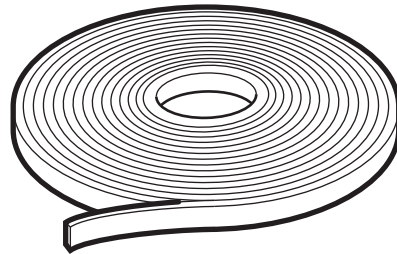
6X

### THICK RUBBER PAD



8X

### FOAM SEAL TAPE



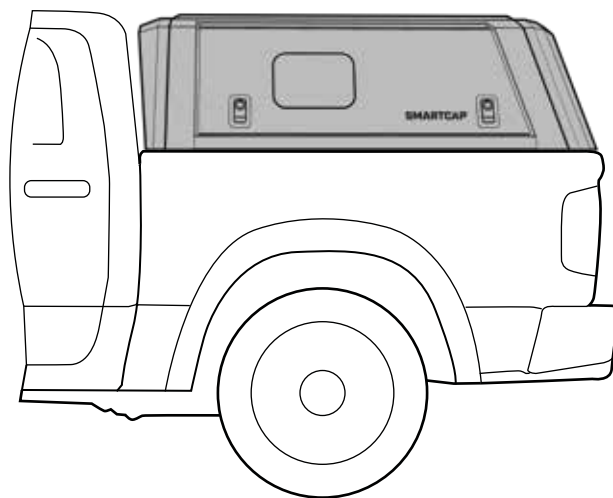
1X

## VEHICLE INSTALLATION



### IMPORTANT

- ▼ ASSISTANCE WILL BE NEEDED FOR THIS INSTALLATION. FOUR PEOPLE ARE RECOMMENDED TO LIFT THE SMARTCAP ONTO THE VEHICLE.
- ▼ AVOID PINCHING OR CRUSHING HANDS AND FINGERS.
- ▼ READ THROUGH THE ENTIRE PROCEDURE BEFORE STARTING.



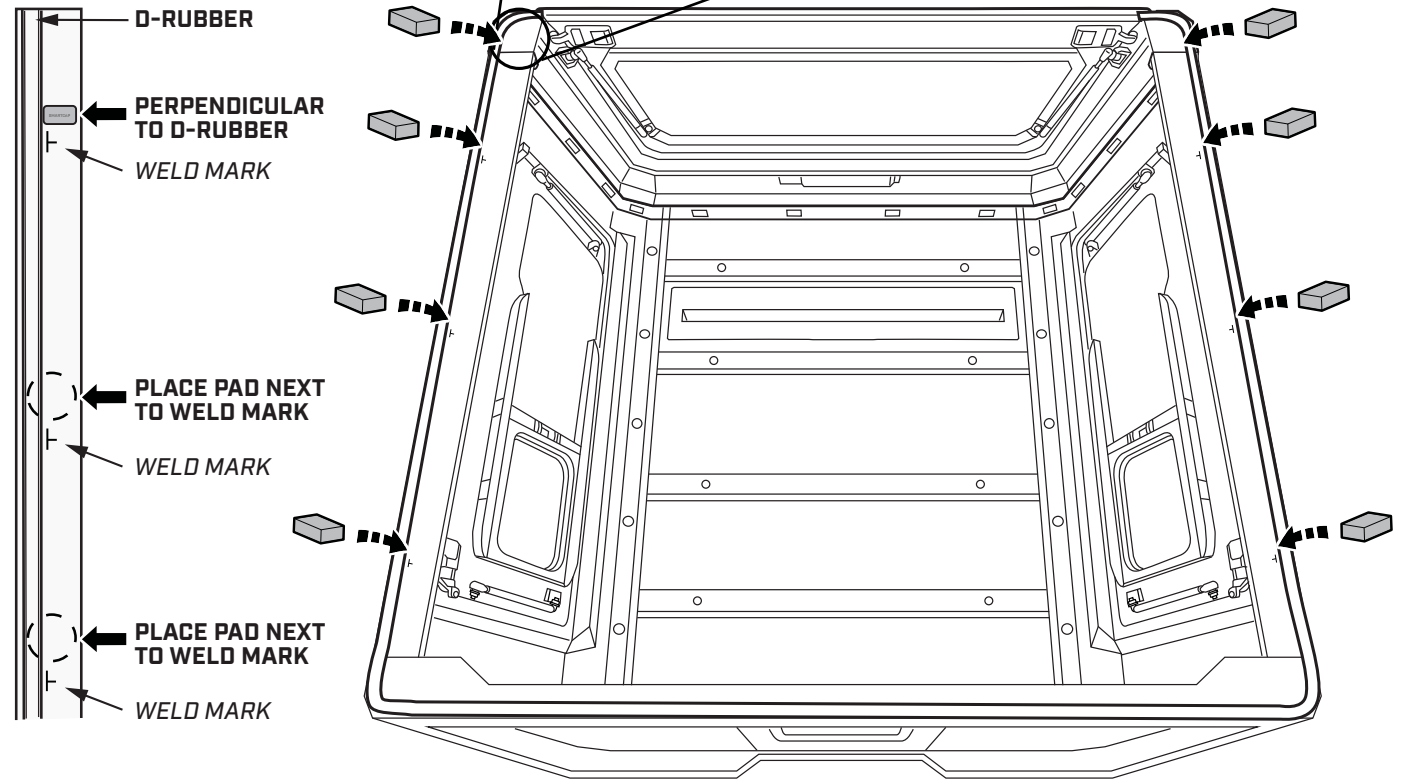
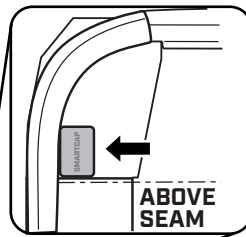
I-SHEET-NA-F3

# STEP 24

REMOVE THE ADHESIVE BACKING FROM THE THICK RUBBER PAD.  
PLACE THE PADS ALONG THE INSIDE OF THE D-RUBBER AT THE INDICATED LOCATIONS.

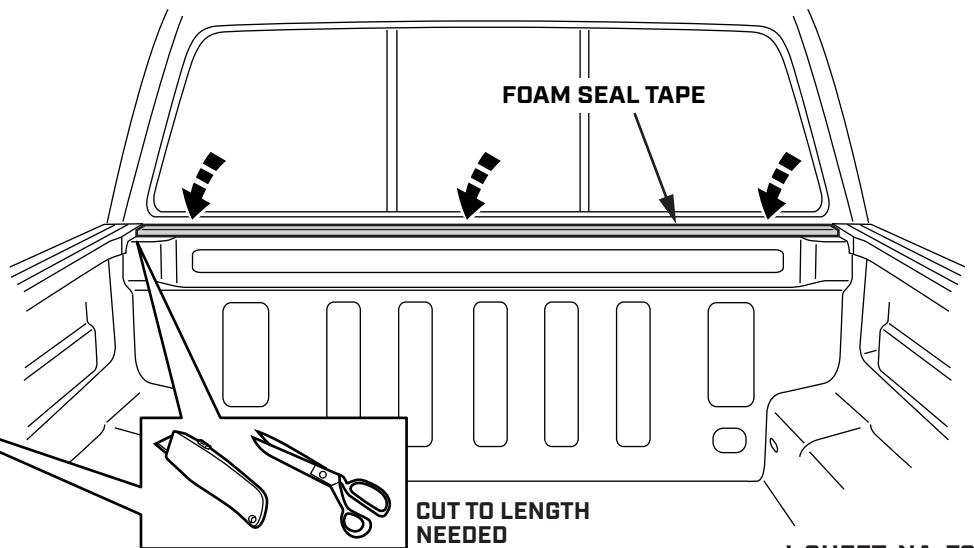
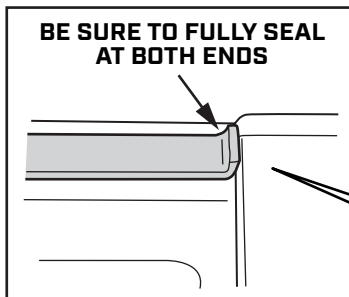
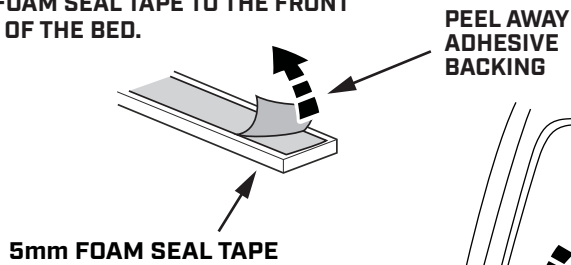
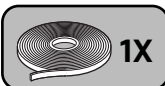


PLACE EXTRA PAD ON REAR FLANGE, PARALLEL TO THE D-RUBBER



# STEP 25

INSPECT THE TRUCK BED. IF FRONT EDGE IS LOWER THAN THE SIDES, ADD FOAM SEAL TAPE TO THE FRONT EDGE OF THE BED.



I-SHEET-NA-F3

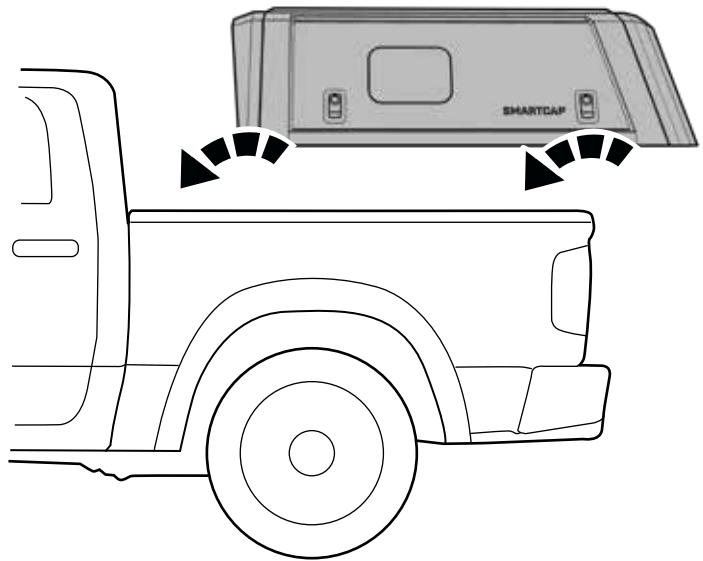


## STEP 26

USE 4 PEOPLE TO LIFT THE ASSEMBLED SMARTCAP ONTO THE TRUCK BED.

TO AVOID DAMAGE TO THE D-RUBBER, DO NOT SLIDE THE SMARTCAP INTO PLACE.

4 PERSON JOB

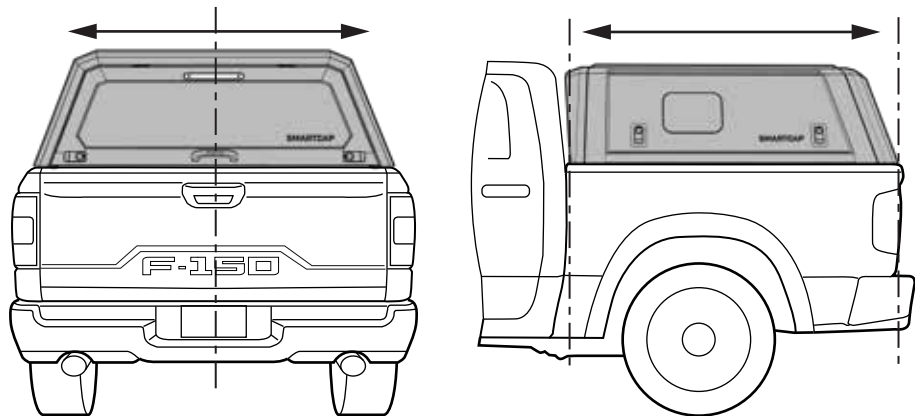


## STEP 27

CHECK THAT THE SMARTCAP IS PROPERLY POSITIONED AND CENTERED ON THE TRUCK BED.

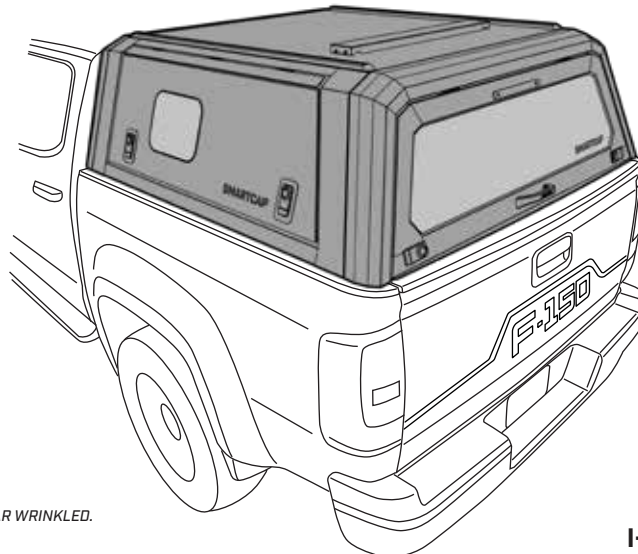
IT'S IMPORTANT THAT THE SMARTCAP IS NOT PUSHED TOO FAR FORWARD, LEAVING A GAP BETWEEN THE SMARTCAP AND THE CAB.

4 PERSON JOB



## STEP 28

WALK AROUND THE TRUCK BED TO MAKE SURE THE D-RUBBER FITMENT IS CORRECT AND THAT THE RUBBER LIP IS PROPERLY TUCKED UNDERNEATH THE CAP.



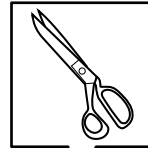
\*YOU MAY NOTICE THAT THE SEAL ON THE SLIDING PORTAL WINDOW MIGHT APPEAR WRINKLED. THIS IS DUE TO THE ANTI-SLIP COATING AND IS NOT A CAUSE FOR CONCERN.

# STEP 29

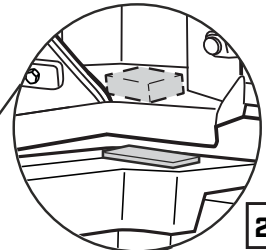
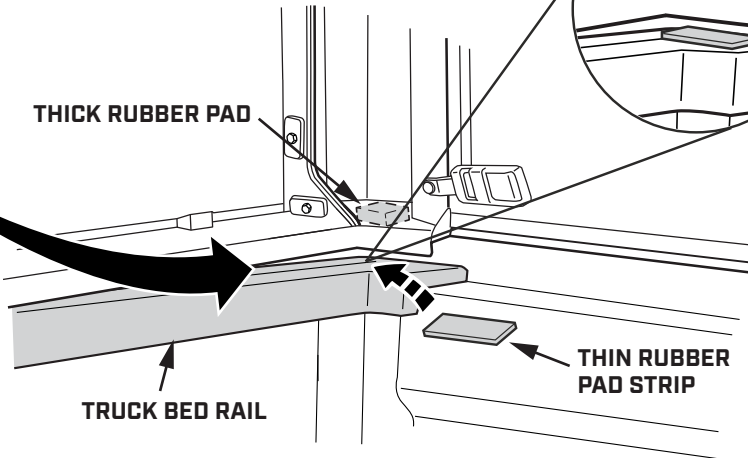
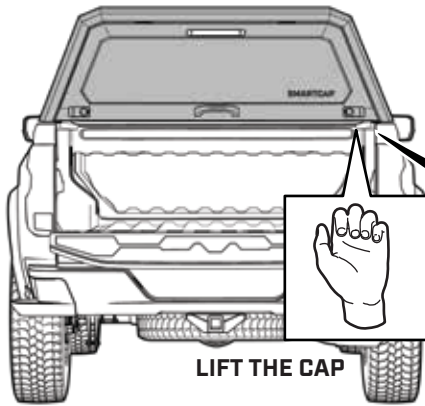
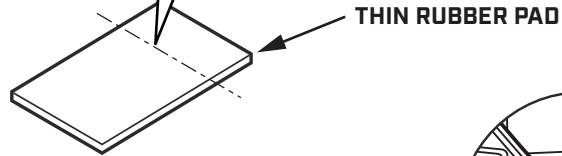
IN ORDER TO ENSURE CORRECT COMPRESSION OF THE D-RUBBER, YOU MUST TRIM TWO 1" INCH STRIPS FROM TWO DIFFERENT THIN RUBBER PADS.

WHILE LIFTING UP ON THE CAP, PLACE 1 STRIP IN EACH REAR CORNER OF THE CAP, IN BETWEEN THE THICK RUBBER PAD AND THE TRUCK BED RAILING.

**REPEAT FOR EACH SIDE**



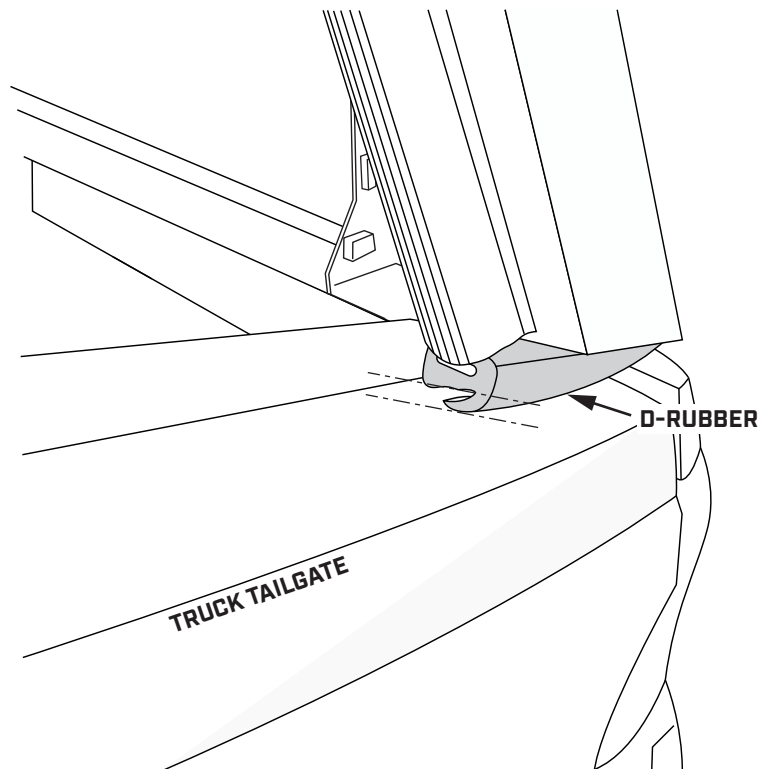
2X



# STEP 30

CHECK THE OPERATION OF THE TAILGATE.

THE LIP OF THE D-RUBBER SHOULD GRAZE THE TAILGATE WHEN OPENING AND CLOSING WITH EASE, CREATING A SATISFYING SEAL.

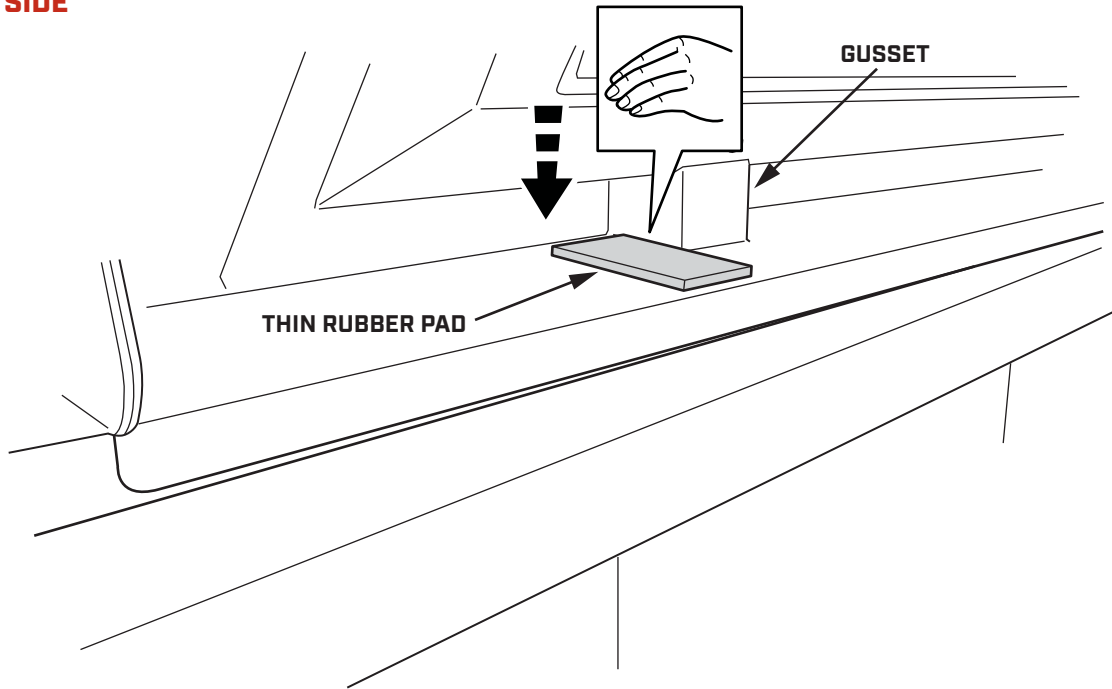


# STEP 31



WITH THE EXCEPTION OF THE REAR CORNERS, PLACE THE THIN RUBBER PADS NEXT TO GUSSETS ON BOTH SIDES OF THE CAP.

**3 PADS PER SIDE**

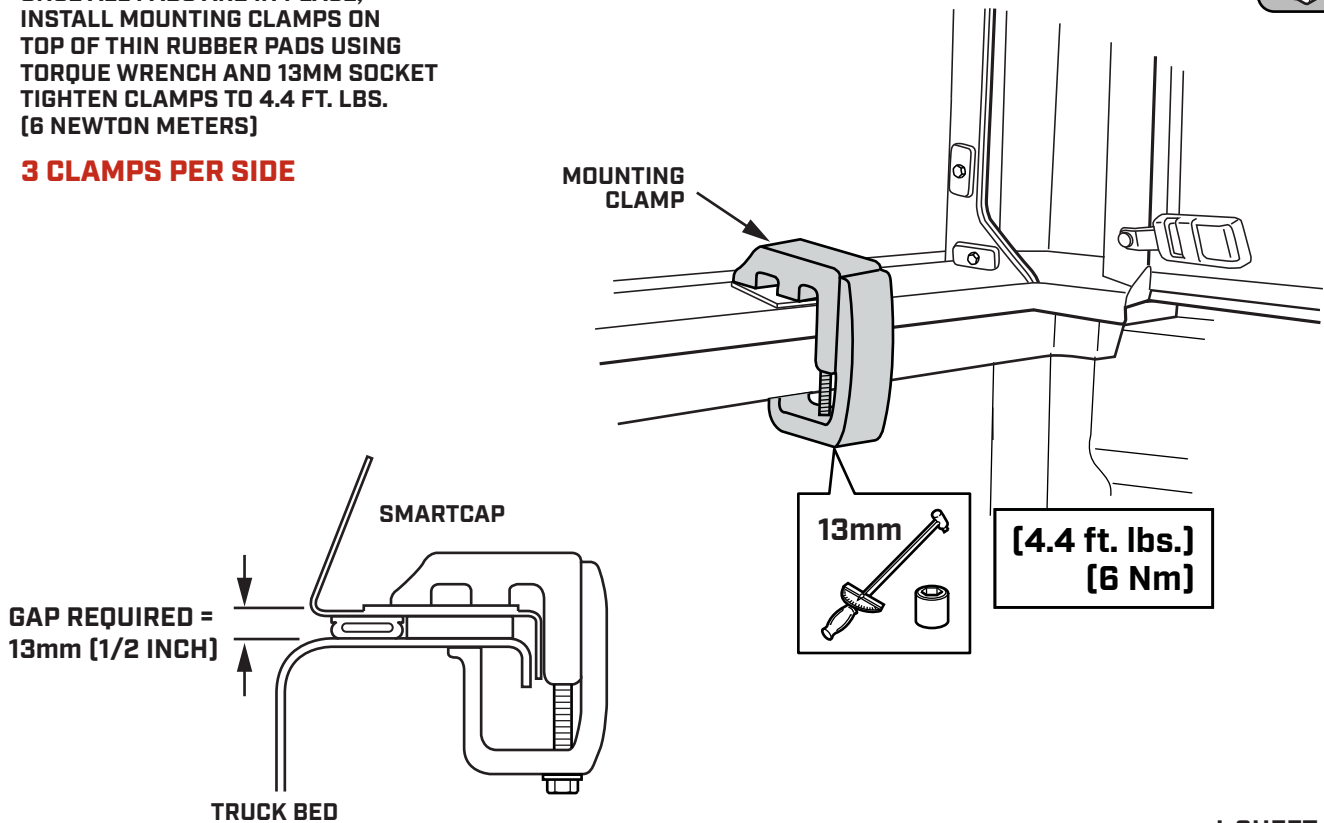


# STEP 32



ONCE ALL PADS ARE IN PLACE, INSTALL MOUNTING CLAMPS ON TOP OF THIN RUBBER PADS USING TORQUE WRENCH AND 13MM SOCKET TIGHTEN CLAMPS TO 4.4 FT. LBS. [6 NEWTON METERS]

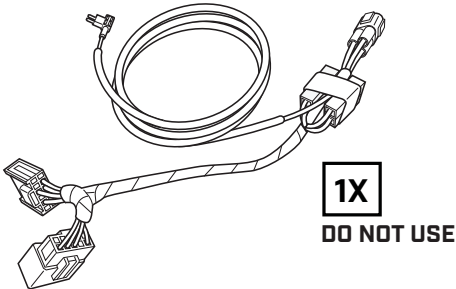
**3 CLAMPS PER SIDE**



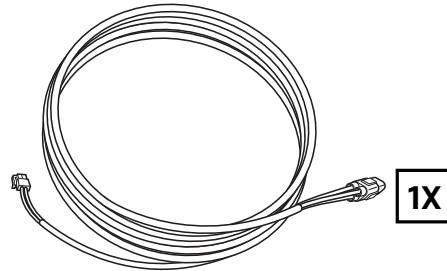
# THIRD BRAKE LIGHT HARDWARE

## VERSION A

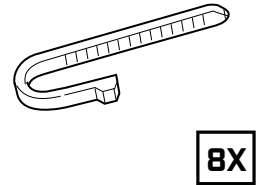
### T-HARNESS



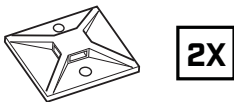
### CONNECTOR HARNESS



### CABLE TIE

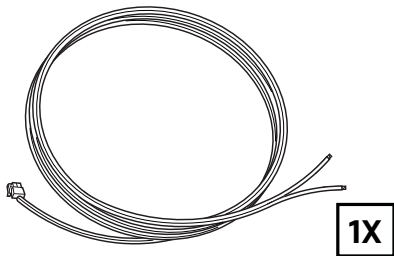


### CABLE TIE BASE

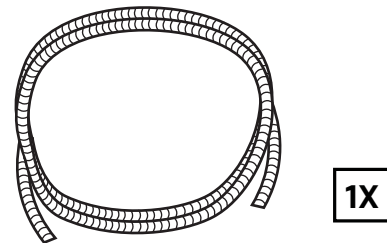


## VERSION B

### CONNECTOR HARNESS



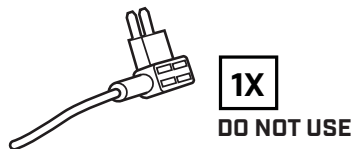
### PLASTIC SHEATH



### FUSES



### FUSE CONNECTOR



### GROUND TERMINAL



### SPLICE TERMINAL



## IMPORTANT

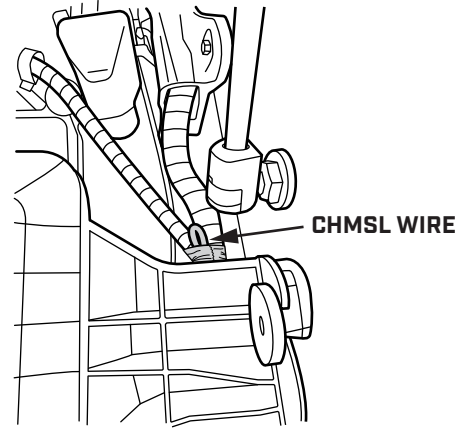
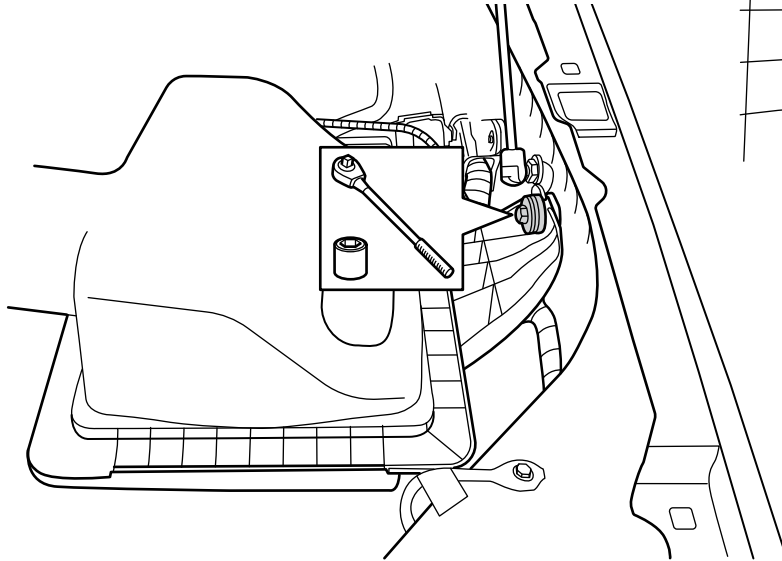
- ▼ BE SURE THE VEHICLE IS TURNED OFF FOR THIS INSTALLATION.
- ▼ READ THROUGH THE ENTIRE PROCEDURE BEFORE STARTING AND FOLLOW THE STEPS CAREFULLY TO ENSURE THE THIRD BRAKE LIGHT WILL FUNCTION PROPERLY.
- ▼ USE A TEST LIGHT TO CHECK FOR SUCCESSFUL INSTALLATION.

# STEP 33

LOCATE THE SMALL CHMSL WIRE.

THE CHMSL WIRE IS TAPED TO A WIRING HARNESS NEAR THE DRIVER SIDE FRONT WHEEL WELL AND DIRECTLY UNDERNEATH THE AIR INTAKE FILTER BOX'S MOUNTING BRACKET.

YOU MAY NEED TO REMOVE THE BOLT HOLDING THE AIR INTAKE FILTER BOX TO ACCESS THE CHMSL WIRE.

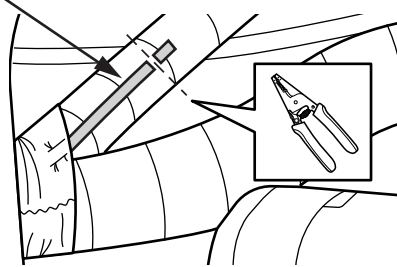


# STEP 34

USE WIRE STRIPPERS TO TRIM OFF END OF THE CHMSL WIRE.

CHMSL WIRE

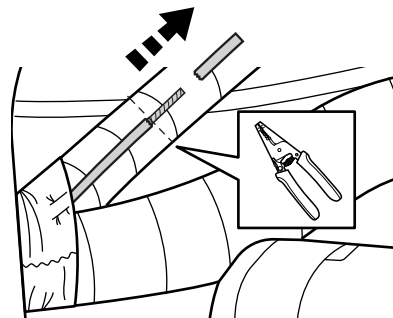
1



USE WIRE STRIPPERS TO REMOVE A HALF INCH OF PLASTIC WIRE INSULATION, EXPOSING THE COPPER WIRING WITHIN.



2

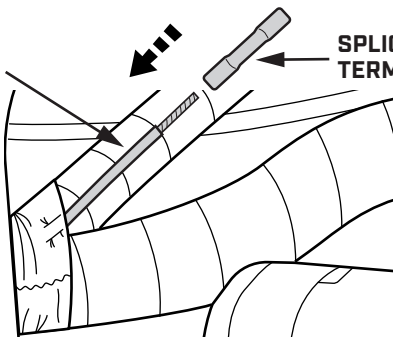


SLIDE THE SPLICE TERMINAL ONTO THE STRIPPED END OF THE CHMSL WIRE.

3

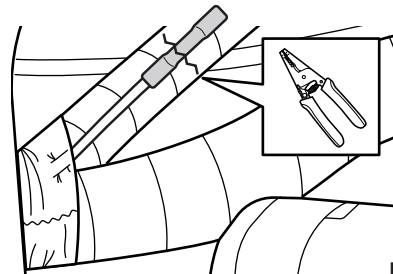
CHMSL WIRE

SPLICE TERMINAL



USE WIRE STRIPPERS TO APPLY FIRM PRESSURE TO THE SPLICE TERMINAL AT THE POINT WHERE THE WIRE ENTERS.

4



I-SHEET-NA-F3

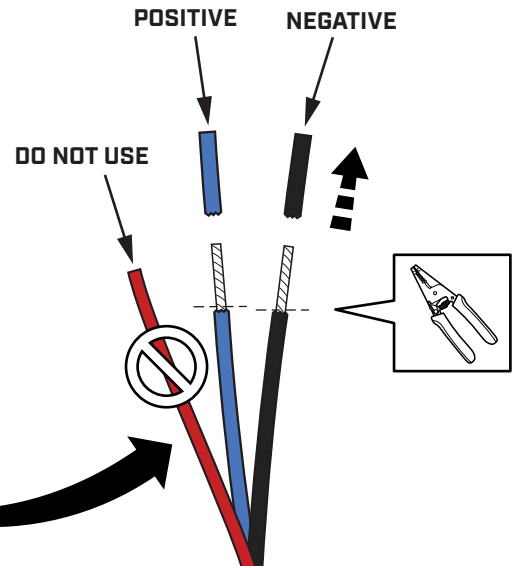
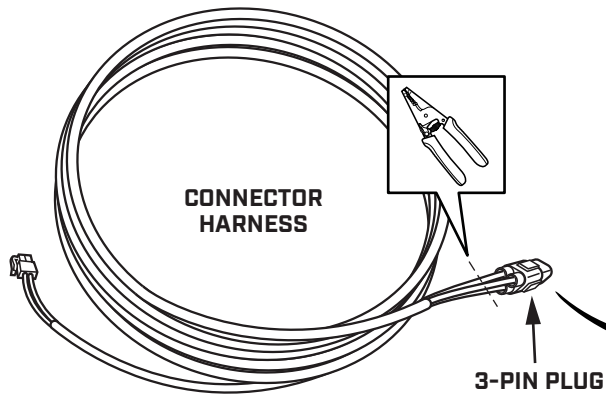
# STEP 35



LOCATE THE SUPPLIED CONNECTOR HARNESS.

USE THE WIRE STRIPPERS TO TRIM OFF THE 3-PIN PLUG OF THE CONNECTOR HARNESS.

USE THE WIRE STRIPPERS TO REMOVE A HALF INCH OF PLASTIC INSULATION FROM THE END OF THE BLUE AND BLACK WIRES.

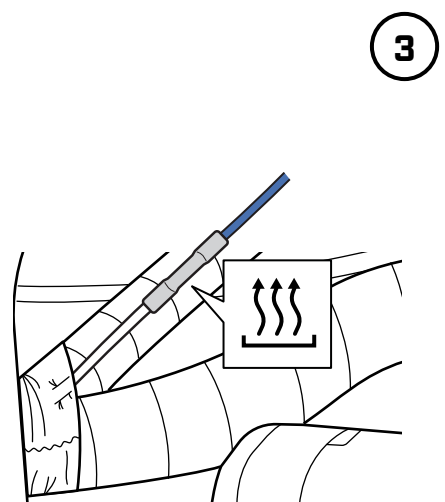
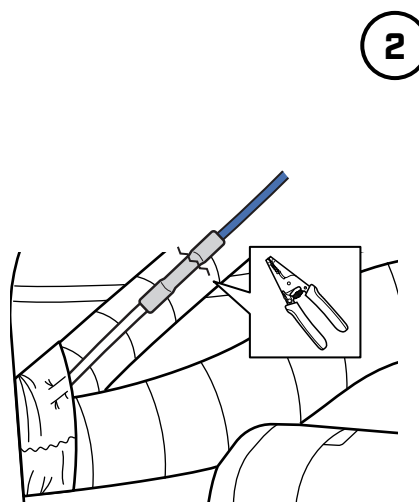
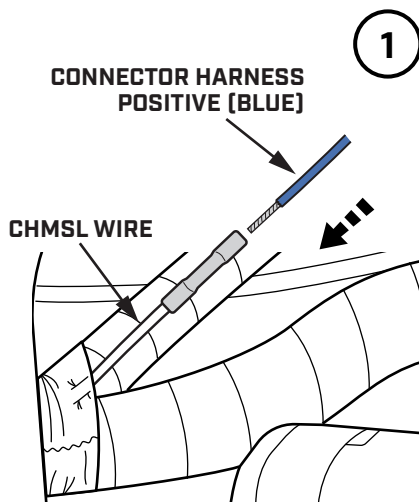


# STEP 36

SLIDE THE STRIPPED END OF THE POSITIVE WIRE FROM THE CONNECTOR HARNESS INTO THE OTHER SIDE OF THE SPLICE TERMINAL.

USE WIRE STRIPPERS TO APPLY FIRM PRESSURE TO THE SPLICE TERMINAL AT THE POINT WHERE THE WIRE ENTERS.

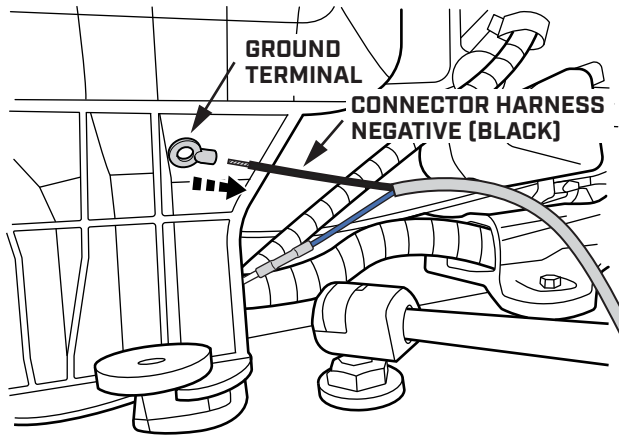
APPLY HEAT TO THE SPLICE TERMINAL TO SHRINK AND CONFORM TIGHTLY AROUND THE WIRES.



# STEP 37

SLIDE THE GROUND TERMINAL ONTO THE STRIPPED END OF THE NEGATIVE WIRE.

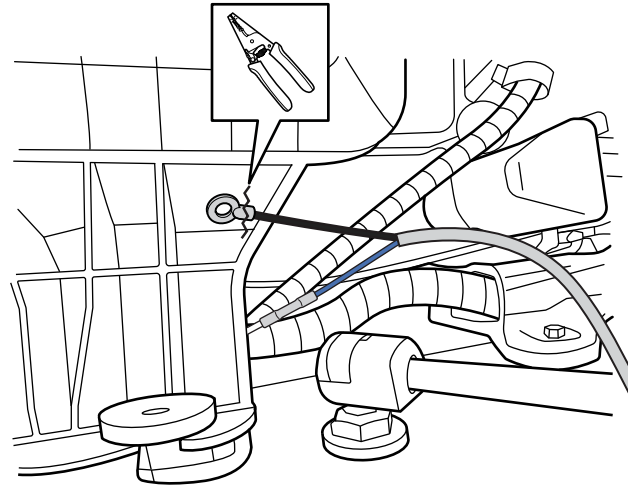
1



1X

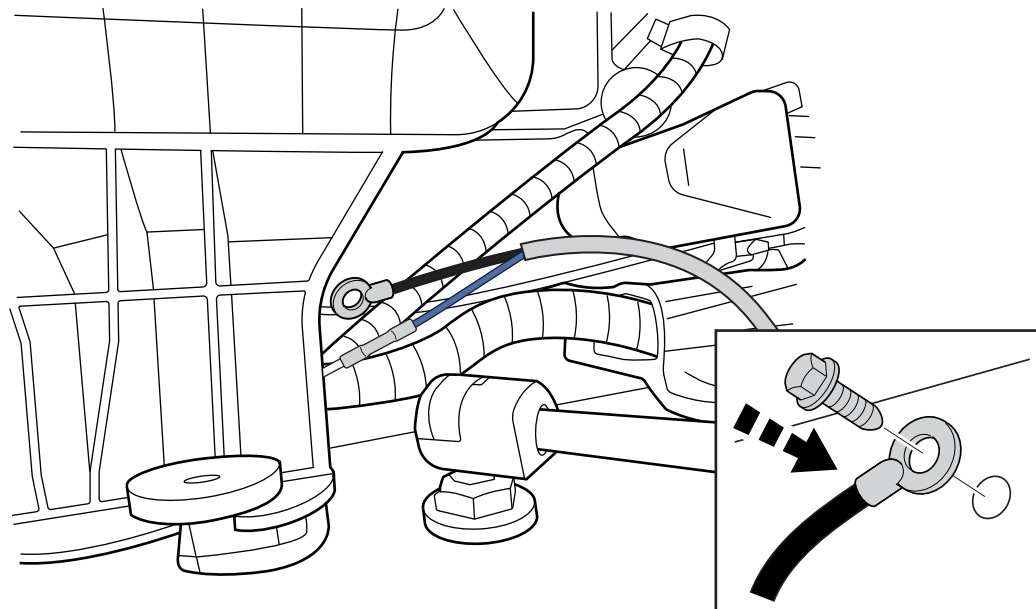
USE WIRE STRIPPERS TO APPLY FIRM PRESSURE TO THE GROUND TERMINAL AT THE POINT WHERE THE WIRE ENTERS.

2



# STEP 38

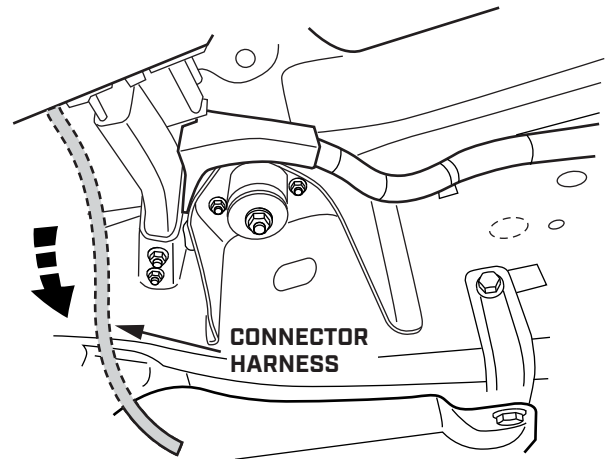
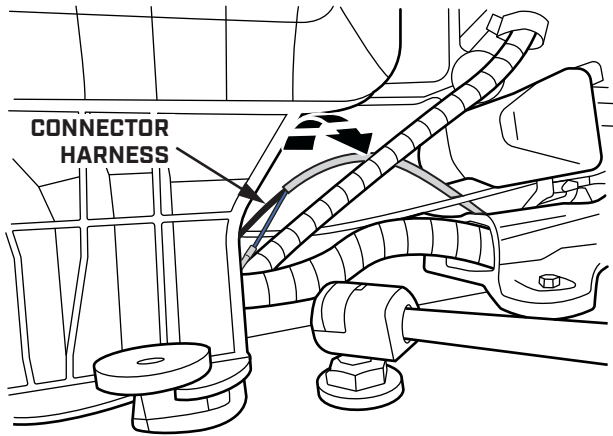
FIND A SUITABLE LOCATION NEAR THE AIR FILTER BOX TO FASTEN THE GROUND TERMINAL TO BE GROUNDED.



I-SHEET-NA-F3

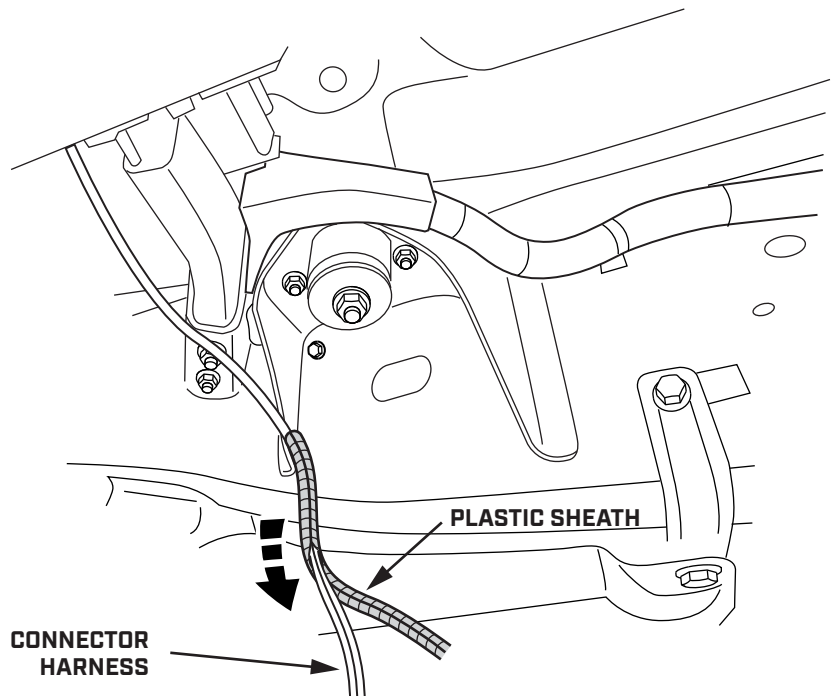
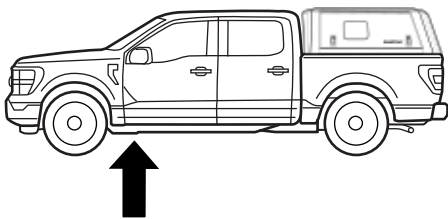
## STEP 39

ROUTE THE CONNECTOR HARNESS DOWN TOWARDS THE UNDERCARRIAGE.



## STEP 40

APPLY THE PLASTIC PROTECTIVE SHEATH ALONG THE ENTIRE LENGTH OF THE CONNECTOR HARNESS.

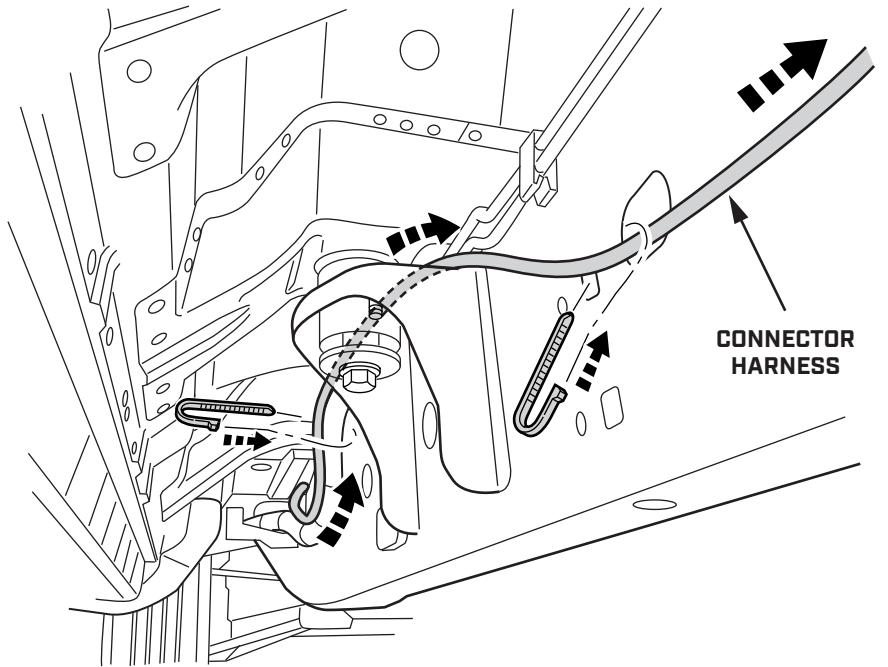
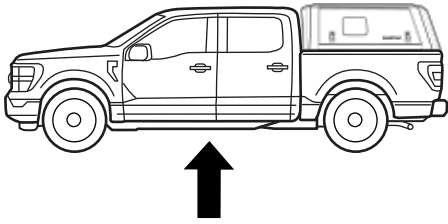


I-SHEET-NA-F3



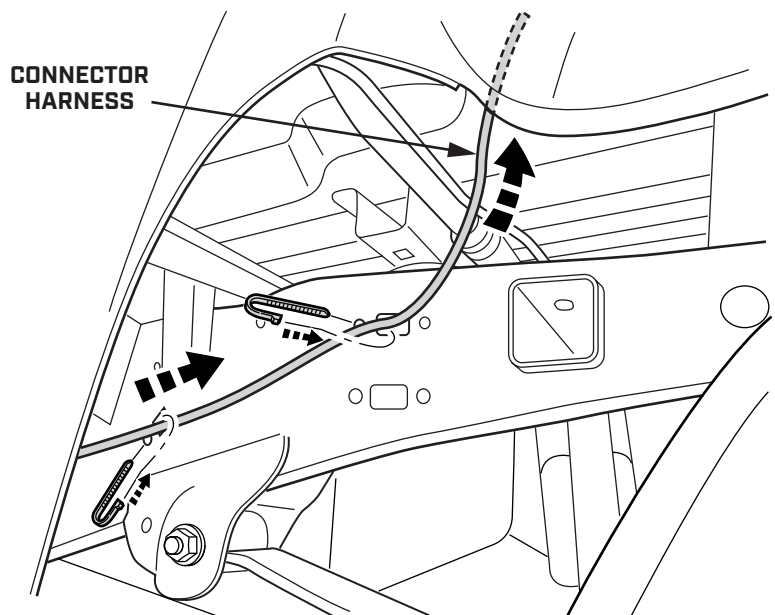
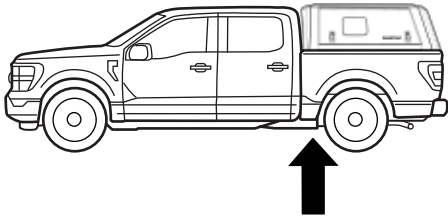
# STEP 41

SECURING TO THE VEHICLE WITH CABLE TIES AT APPROX. 6 INCH INTERVALS WHENEVER POSSIBLE.



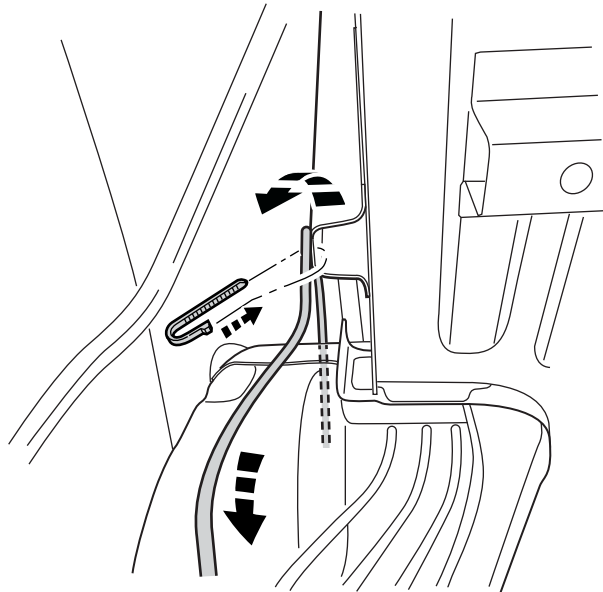
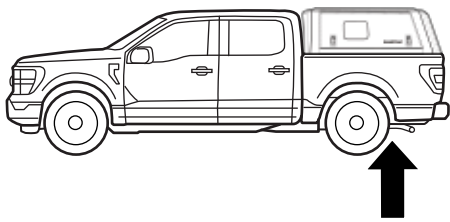
# STEP 42

ROUTE THE CONNECTOR HARNESS UP AND OVER THE REAR WHEEL WELL.



## STEP 43

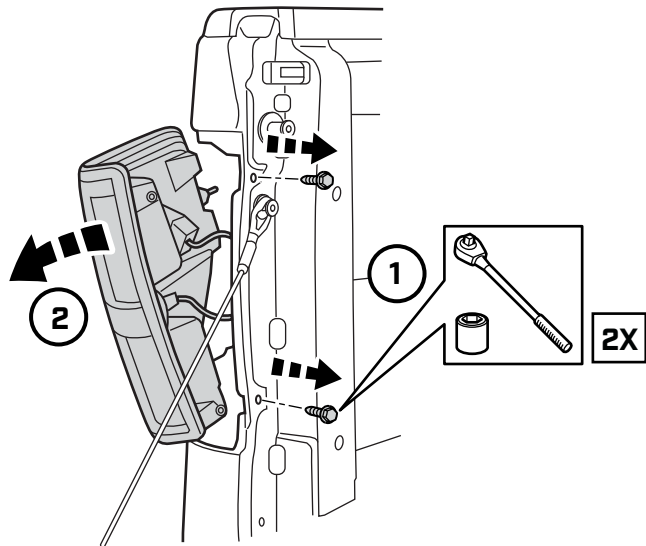
ROUTE THE CONNECTOR HARNESS DOWN OVER THE BACK OF THE REAR WHEEL WELL AND SECURE WITH CABLE TIE AS SHOWN.



## STEP 44

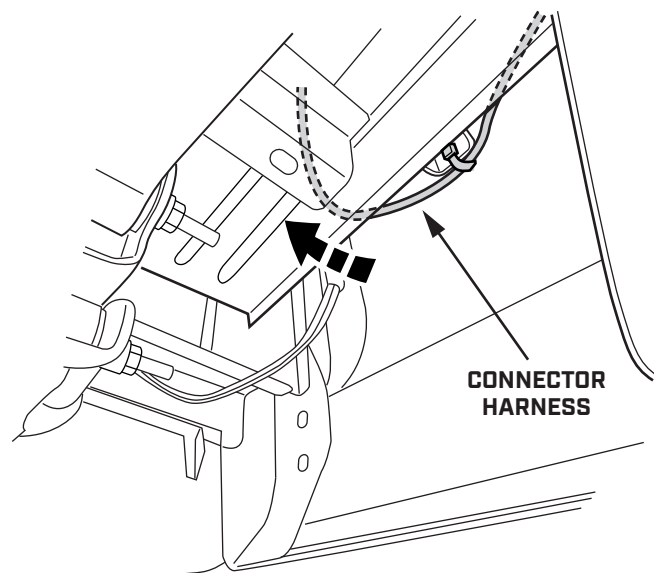
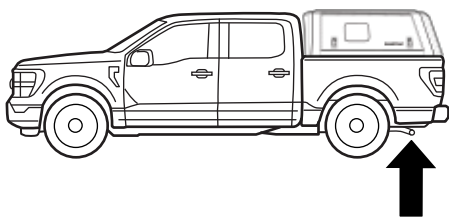
REMOVE THE BOLTS HOLDING THE DRIVER SIDE TAILLIGHT ASSEMBLY.

PLACE THE TAILLIGHT CAREFULLY ON THE TAILGATE. DO NOT UNPLUG ANY CONNECTORS.



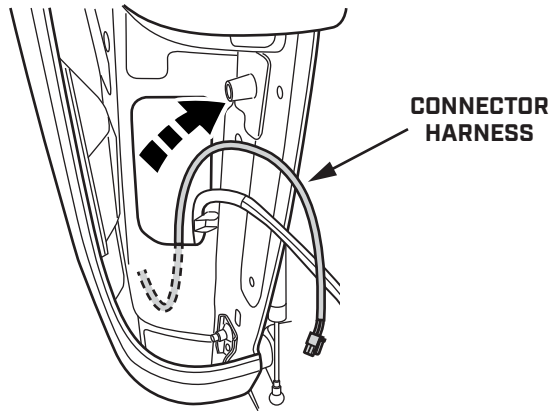
## STEP 45

ROUTE THE CONNECTOR HARNESS UP TOWARDS THE TAILLIGHT CAVITY.

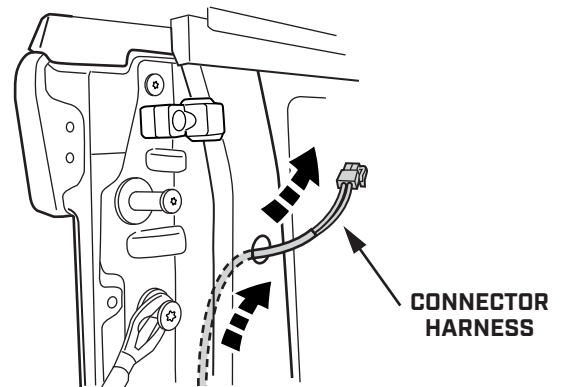


## STEP 46

CAREFULLY PULL THE CONNECTOR HARNESS OUT THROUGH THE TAILLIGHT CAVITY.

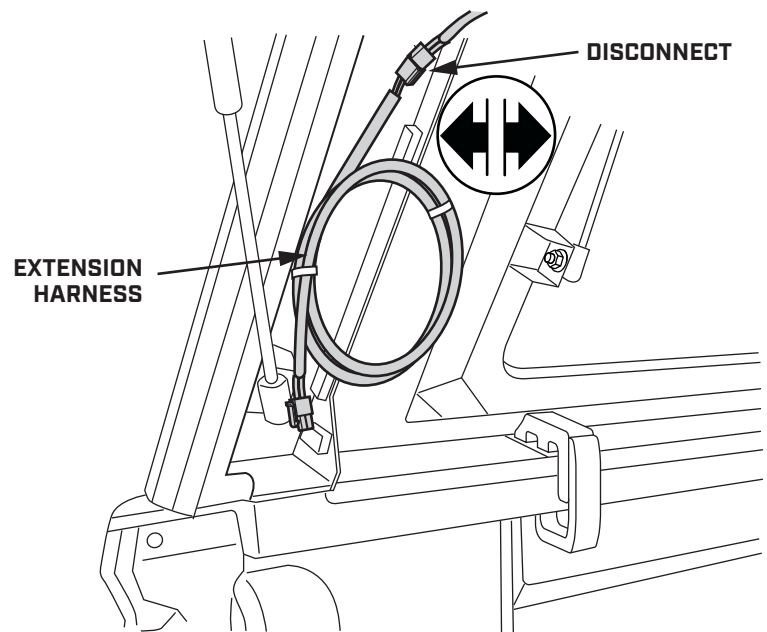


ROUTE THE CONNECTOR HARNESS UP AND OUT THROUGH THE HOLE IN THE SIDE OF THE BED.



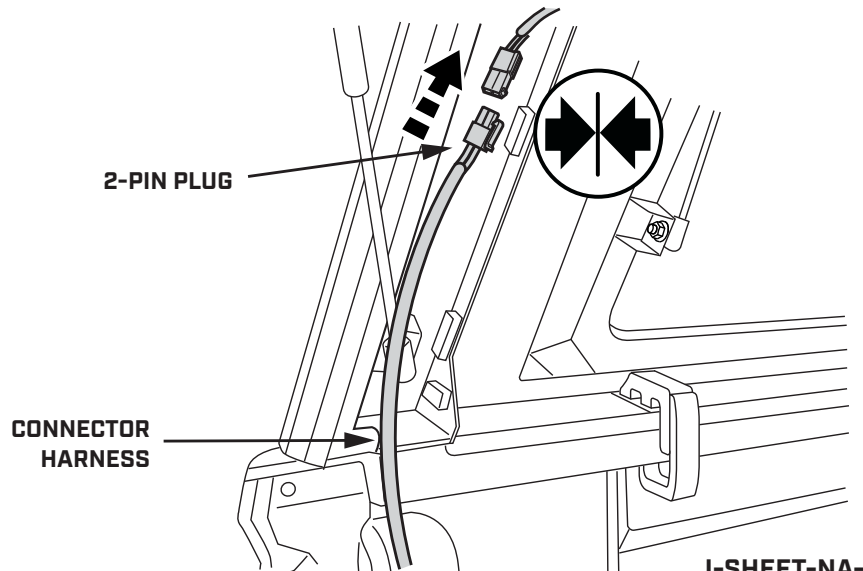
## STEP 47

LOCATE AND DISCONNECT THE THIRD BRAKE LIGHT EXTENSION HARNESS FROM THE INSIDE BACK LEFT CORNER OF THE SMARTCAP.



## STEP 48

CONNECT THE 2-PIN PLUG FROM THE CONNECTOR HARNESS TO THE THIRD BRAKE LIGHT HARNESS.

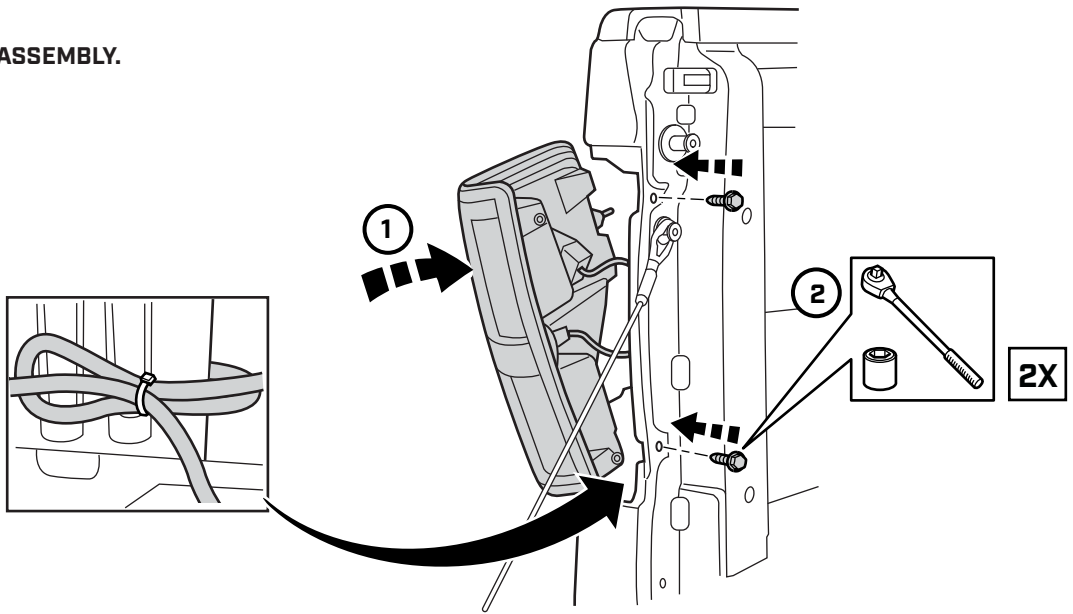


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## STEP 49

REINSTALL THE TAILLIGHT ASSEMBLY.

BUNDLE EXTRA HARNESS LENGTH IN THE TAIL LIGHT CAVITY AND SECURE WITH A CABLE TIE.



## STEP 50



### TEST YOUR BRAKE LIGHTS & TURN SIGNALS

- ▼ START THE TRUCK. SOME MODELS MAY TAKE UP TO 30 SECONDS FOR THE VEHICLE TO DETECT THE NEW CONNECTION.
- ▼ CHECK THE BRAKE LIGHTS AND TURN SIGNALS TO BE SURE THEY ARE FUNCTIONING PROPERLY.
- ▼ ONCE YOU HAVE CONFIRMED THAT THE LIGHTS ARE WORKING CORRECTLY, SECURE THE HARNESS WITH CABLE TIES.
- ▼ BE SURE NOT TO INTERFERE WITH ANY MOVING PARTS ON THE VEHICLE.

# SMARTCAP<sup>®</sup>

THANKS FOR YOUR PURCHASE.  
PLEASE LET US KNOW IF YOU HAVE ANY QUESTIONS.

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[SUPPORT.SA@SMARTCAP.COM](mailto:SUPPORT.SA@SMARTCAP.COM) - REST OF WORLD



I-SHEET-NA-F3