



INSTALLATION INSTRUCTIONS

Accessory

HPD SUPERCHARGER KIT
06100-F27S-A00

Application

2011-14 CR-Z

Publications No.

VERSION 3

Issue Date

DEC 2014

NOTE: The HPD Supercharger Kit requires unleaded gasoline of 91 octane or higher, and an ECM/PCM software update. Always use Honda Ultimate Synthetic 0w-20 engine oil.

Customer Information: The information in this installation instruction is intended for use only by skilled technicians who have the proper tools, equipment, and training to correctly and safely add equipment to your vehicle. These procedures should not be attempted by "do-it-yourselfers."

PARTS LIST

Make sure you have all four kits and the contents in each kit before starting. For additional parts information see page 43.

Traction System Kit P/N 06110-F27S-A00

Kit Contents

1	Oil Tank Plate	17601-F27S-A04
1	Traction oil Hardware Kit	17630-F27S-A00
1	Sleeve, Res/Filter	17632-F27S-A00
1	Sleeve, Filter/SC	17632-F27S-A10
1	Sleeve, SC/Oil Cooler	17632-F27S-A20
1	Sleeve, Res//Oil Cooler	17632-F27S-A30
1	Traction Oil Hose Kit	17632-FC4Y-A01
4	AV Mount M6	91114-FC4Y-A00
5	Washer Bolt 6X12 mm	934030-6012-08
14	Self-Lock Nut 6 mm	94050-06000
2	Cushion Clamp 2.25"	91955-FC4Y-A00
1	Cushion Clamp 2"	91955--FC4Y-B00
1	Cushion Clamp 7/8"	91955FC4Y-C00
1	Clamp -10	15632-FC4Y-A30
1	Flange Nut 8 mm	94050-08080
6	Cable Tie	32948-FC4Y-A20
1	Traction Cooler	19500-F27S-A00

Airbox System Kit P/N 06120-F27S-A00

Kit Contents

1	Breather Pipe Grommet	17136-REJ-W00
1	Upper Airbox	17210-F27SA200
1	Air Cleaner Element	17220-RX0-A00
1	Lower Airbox	17240-F27S-A21
2	Flange Bolt 6X45 mm	95701-06045-08

2	Airbox Washer 8 mm Thick	90401-FC4Y-A00
2	Airbox Large Dia Washer	90415-FC4Y-B00
3	Air Cleaner Clip	17217-F27S-A00

Intercooler System Kit P/N 06130-F27S-A00

Kit Contents

1	SC inlet Conn Tube	17226-F27S-A11
2	D Clamp 15.5 mm	53729-671-003
1	Tee Fitting	17231-F27S-A00
1	Pipe Cover	17243-F27S-A02
1	IC Bar Mount.	17262-F27S-A02
1	IC Inlet Pipe bracket Upper	17271-F27S-A01
1	IC Inlet Pipe bracket Lower	17272-F27S-A01
1	IC Outlet Pipe bracket & Horn	17273-F27S-A01
1	Throttle Body Conn Tube	17281-F27S-A11
1	IC Outlet Pipe	17282-F27S-A11
1	IC Outlet Tube	17283-F27S-A11
1	IC Inlet Tube	17284-F27S-A11
1	SC Outlet Tube	17285-F27S-A20
1	Airbox Inlet Tube	17286-F27S-A11
1	Bypass Valve outlet Tube	17288-F27S-A21
1	SC Inlet Pipe	17488-F27S-A11
1	IC Outlet Pipe	17489-F27S-A02
1	IC Inlet Pipe	17490-F27S-A03
1	IC throttle Body Pipe	17491-F27S-A05
1	HPD Placard (with ECM/PCM programming)	17495-F27S-A02
1	Intercooler	19700-F27S-A02
1	Bypass Valve	17846-FC4Y-A01
1	Vacuum Tube	36181-F27S-A01
1	Protective Sleeve 13 mm	17633-F27S-A00
3	IC AV Mount M8	19701-F27S-A00
1	AV Mount M8	91113-FC4Y-A00
2	Flange Bolt 8X120 mm	95701-08120-08
2	Washer	91911-FC4Y-A00
1	Spacer 3/4in X 3/8"	90515-FC4Y-A10
1	Socket Head Screw 8X25 mm	90123-FC4Y-A00
1	IC Bracket	19702-F27S-A00
3	Flange Nut 8 mm	94050-08080
3	Hose Clamp 25-40	91950-FC4Y-A00
4	Hose Clamp 50-70	91952-FC4Y-A00
10	Hose Clamp 60-80	91953-FC4Y-A00
7	Flange Bolt 6X12 mm	95701-06012-08

8	Flange Bolt 6X16 mm	95701-06016-08
2	Button Bolt 4X8 mm	90108-FC4Y-A40
6	Cable Tie	32948-FC4Y-A10
1	Washer Tank	76841-F27S-A01
1	Washer Tank Bracket	17274-F27S-A00
5	Flange Bolt 6X12 mm	95701-06012-08
2	Flange Bolt 6X8 mm	95701-06008-08
2	Flange Nut 6mm	94050-06080
1	Protective Sleeve AC 19 mm	17634-F27S-A00
1	Protective Sleeve AC 25 mm	17635-F27S-A00
1	Fuel Filler Caution Label	17669-SL0-A00
1	PCV Valve	17130-FC4Y-A01
2	Tube Clamp	95002-41200-04

Accessory Drive System Kit P/N 06140-F27S-A00

Kit Contents

1	Crankshaft Pulley	13810-F27S-A00
1	Supercharger w/105mm	17800-F27S-A00
1	SC mount Bracket	17821-F27S-A10
1	SC Spacer	17822-F27S-A02
1	SC Spacer	17823-F27S-A01
2	SC Spacer	17824-F27S-A00
1	Belt Tensioner Bracket	17830-F27S-A10
1	Inner Bearing Cover	17841-F27S-A01
1	Outer Bearing Cover	17842-F27S-A01
1	Drive Belt	17845-FC4Y-A00
1	Water Pump Pulley	19224-F27S-A00
1	Idler Pulley	31190-RCA-A02
1	Compressor Clutch	38910-F27S-A01
1	Bolt 10X65 mm	90014-RYX-000
1	Flange Bolt 10X32 mm	95801-10032-08
1	Socket Bolt 8X75 mm	96700-08075-18
1	Socket Bolt 8X40 mm	96700-08040-18
2	Flange Nut 8 mm	94050-08080
1	Anti-rotation Nut	17850-F27S-A10
1	Flange Bolt 8X65 mm	95801-08065-08
4	Port Gasket	17115-RB0-007
4	Fuel Injectors	16450-RCA-A01
4	Socket Bolt 6X75 mm	96700-06075-18

REQUIRED SPECIAL TOOLS

Belt tensioner tool YA9317

Crank pulley holder 07AAB-RJAA100

Crank pulley holder handle 07AAB-001020B

A/C Compressor Kit 07AAF-000A150

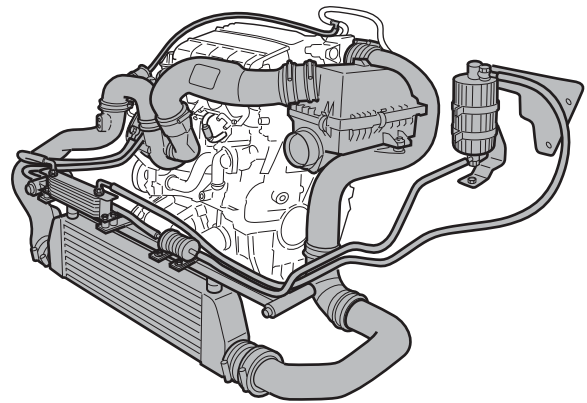
Air Regulator

Eye protection (face shield, safety goggles, etc.)

The following tool is available through the Honda Tool and Equipment Program. On the iN, click on: Service > Service Bay > Tool and Equipment Program, then enter the number under "Search." Or, call 888-424-6857.

• Trim Tool Set (T/N SOJATP2014)

Illustration of the HPD Supercharger Kit



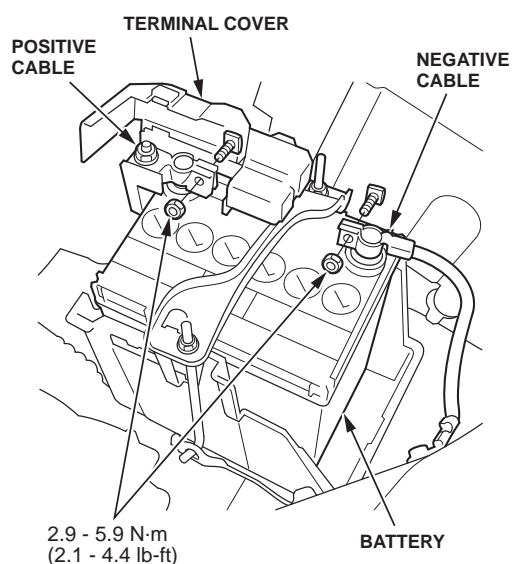
INSTALLATION

Customer Information: The information in this installation instruction is intended for use only by skilled technicians who have the proper tools, equipment, and training to correctly and safely add equipment to your vehicle. These procedures should not be attempted by “do-it-yourselfers.”

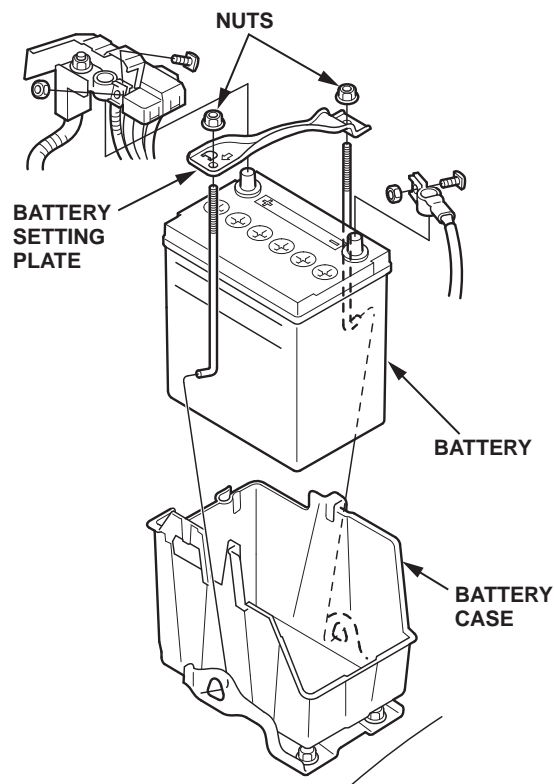
NOTE: Before beginning installation:

- Make sure the vehicle is filled with premium gasoline (91 octane) before starting the engine with the supercharger kit installed.
- Make sure the vehicle is using Honda Ultimate Synthetic 0w-20 engine oil only.
- Allow **four days** for ECM/PCM re-programming.
NOTE: HPD ECM/PCM Recalibration Form must be sent with the ECM/PCM
- Confirm you have all of the required parts.
- Take the necessary precautions to prevent damage to the paint finish.
- Make sure you have the anti-theft code for the audio unit, navigation system (if equipped), and the radio station presets.

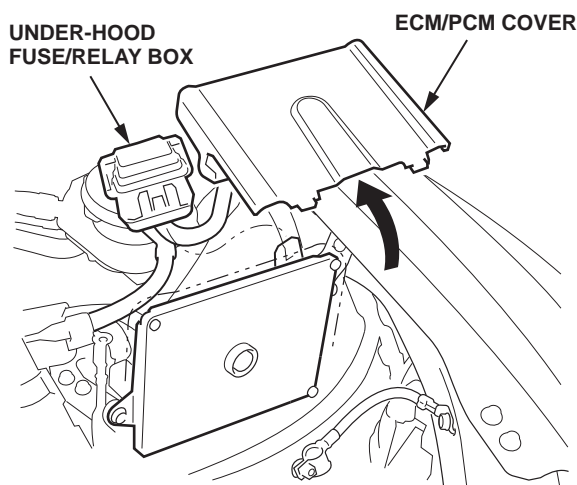
1. Disconnect the battery.



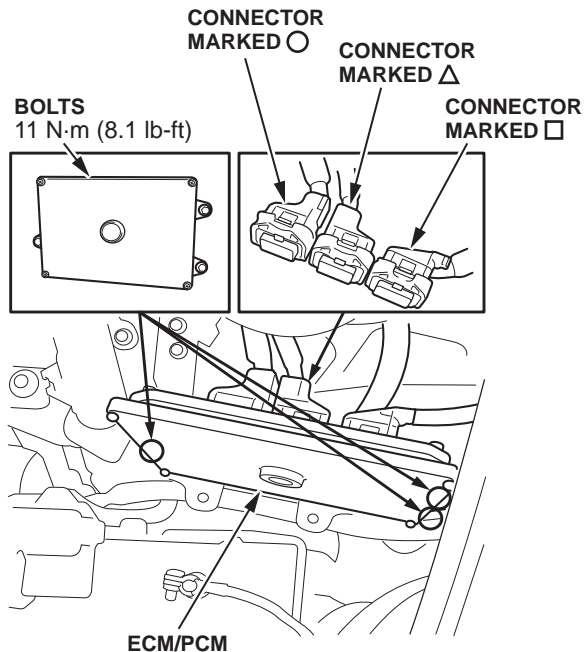
2. Remove the battery and battery case.



3. Remove the auxiliary under-hood fuse/relay box and the ECM/PCM cover.

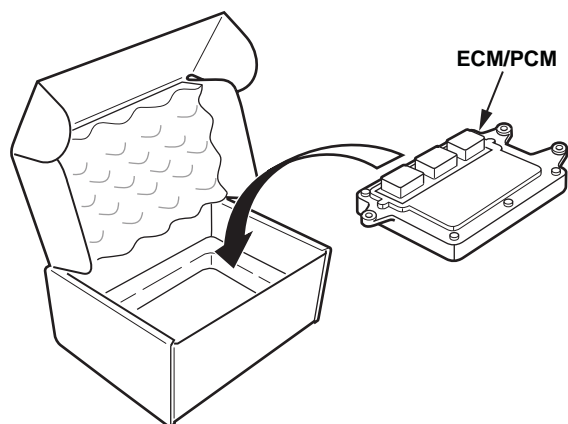


4. Remove the bolts, and disconnect the ECM/PCM connectors. Remove the ECM/PCM, fill out the HPD ECU Recalibration Form, and ship them to HPD.



Shipping Instructions: place the ECM/PCM into the prepaid and pre-addressed FED EX box, then ship the ECM/PCM to Honda Performance Development, Inc.

Address: Honda Performance Development, Inc
Attn: HPD CR-Z ECU Reflash Program
25145 Anza Drive, Santa Clarita, CA 91355

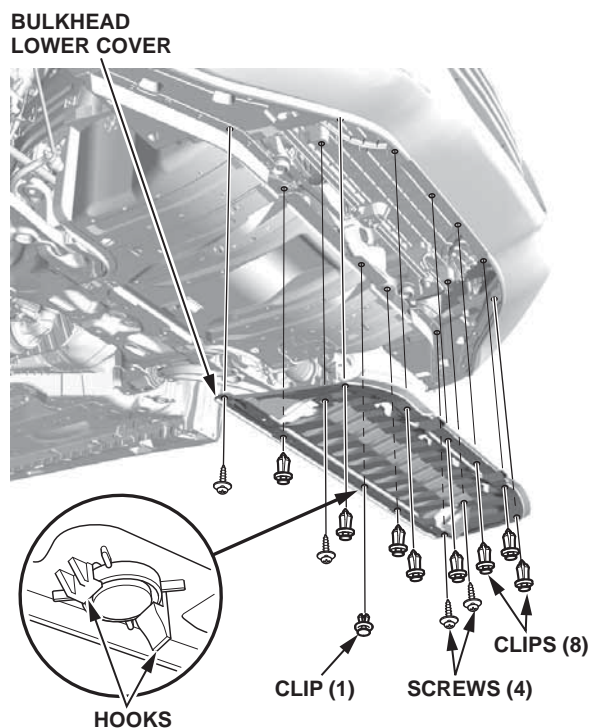


5. **Front bumper and trim removal:**

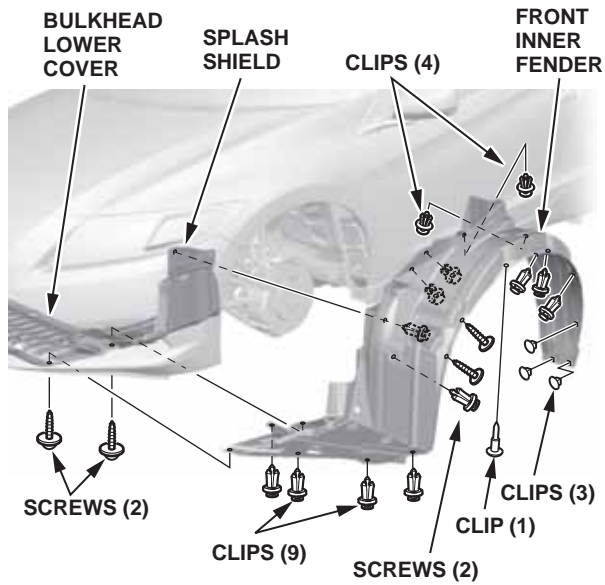
- 5.1 With the vehicle on Jack stands or on a hoist remove the front wheels.



- 5.2 Remove the front bulkhead lower cover from the front bulkhead.



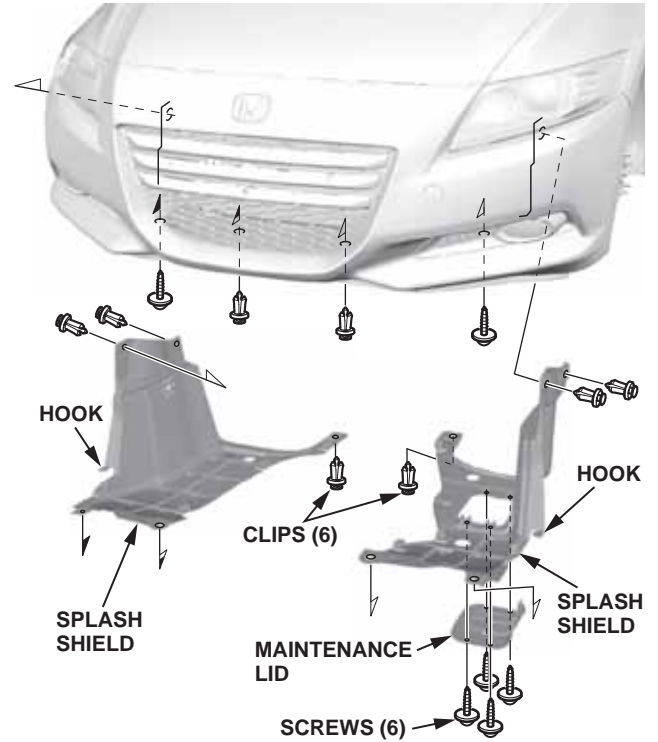
5.3 Remove the front inner fender. Repeat this step on the other side.



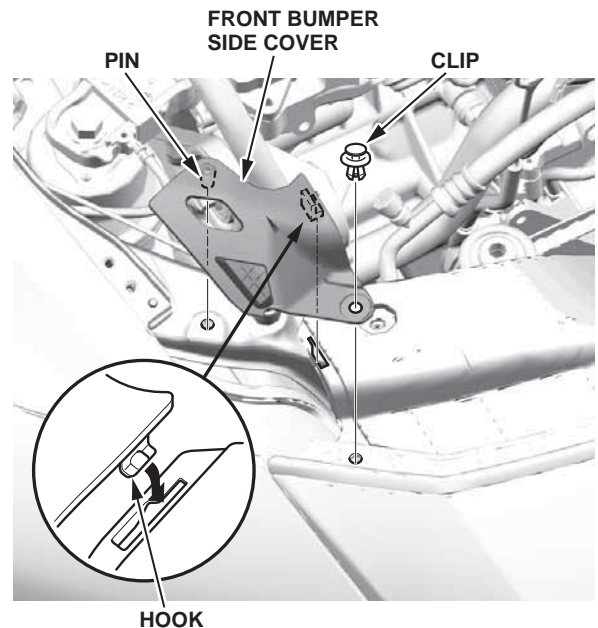
5.4 Remove the engine undercover.



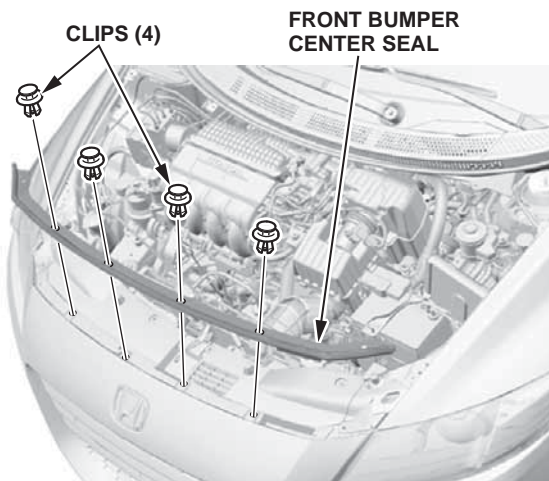
5.5 Remove the splash shields.



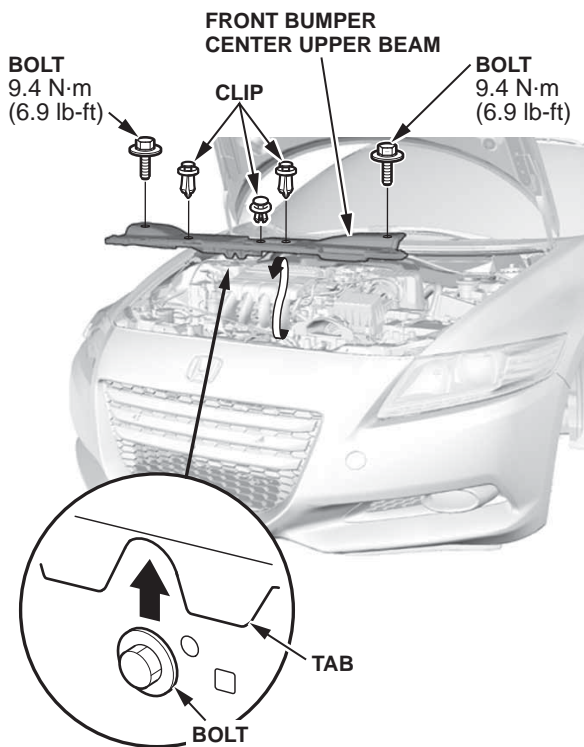
5.6 Remove the front bumper side cover. Repeat this step on the other side.



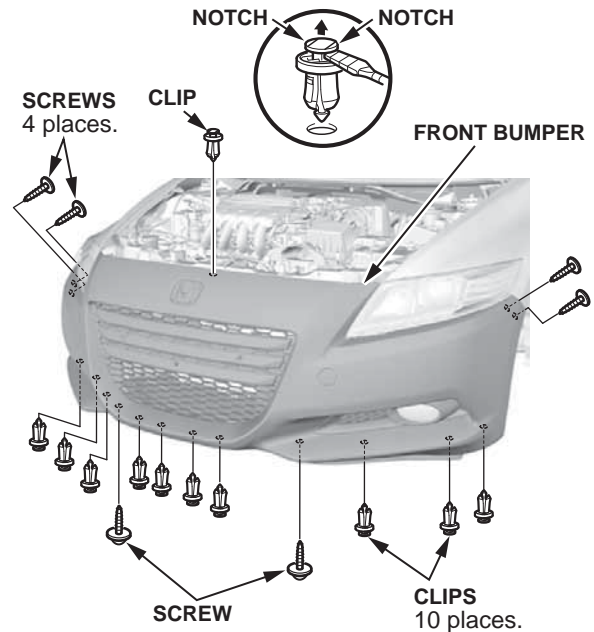
- 5.7 Remove the clips, then remove the front bumper center seal.



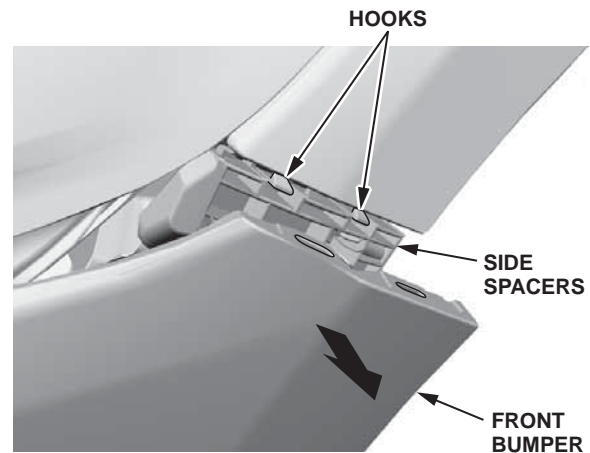
- 5.8 Remove the bolts and clips. Lift the front bumper center upper beam up to clear the front bolt, then remove the beam.



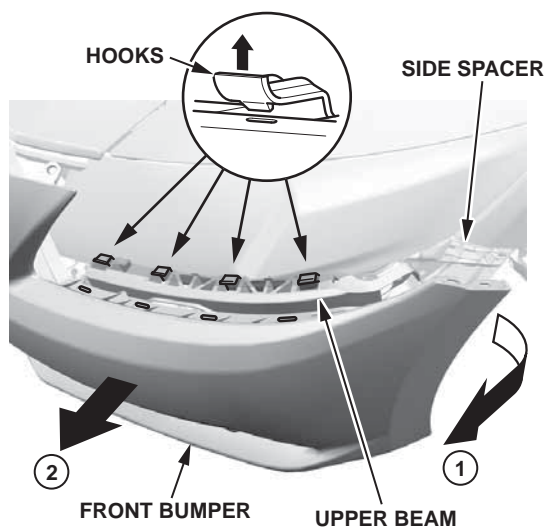
- 5.9 Remove the screws and clips from the front bumper.



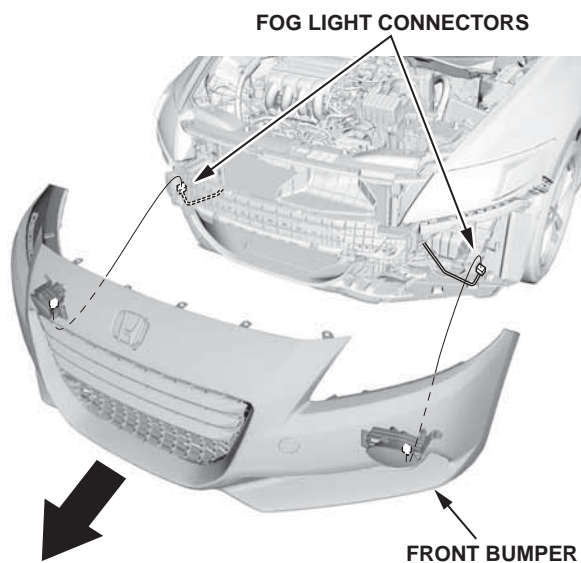
- 5.10 Pull out the front bumper in the wheel well area to release it from the side spacer hooks.



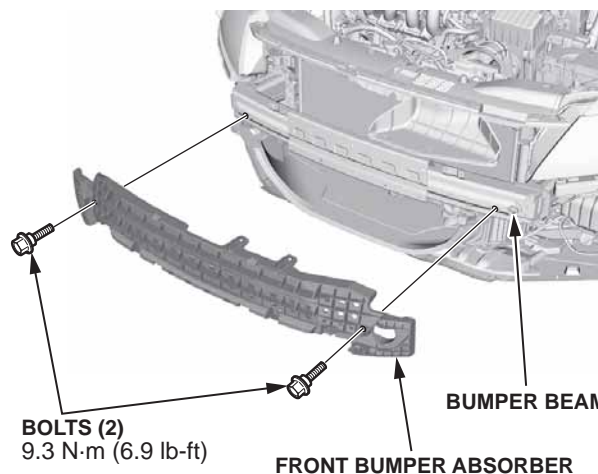
- 5.11 With the help of an assistant, pull both sides of the front bumper away from the side spacers. Then pull the front bumper forward to release the hooks.



- 5.12 Disconnect the fog light connectors, then remove the front bumper. Set the front bumper on a blanket to prevent damage.

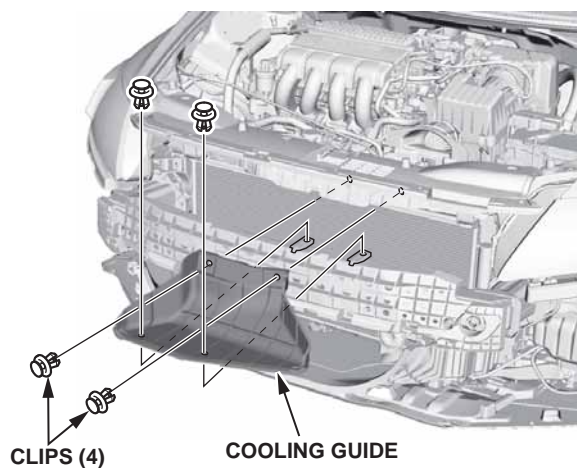


- 5.13 Remove the front bumper absorber.

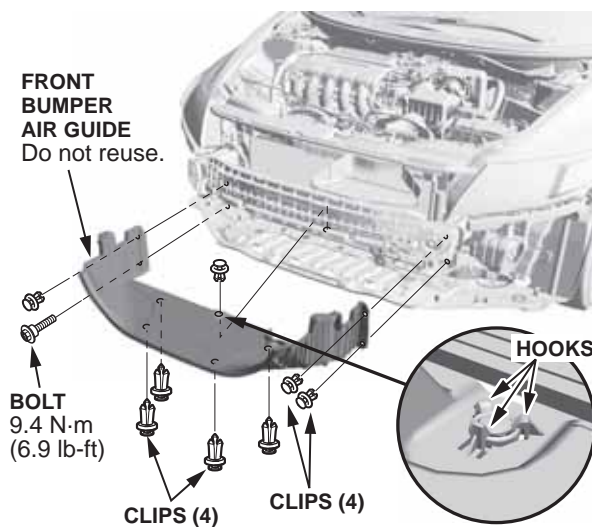


- 5.14 If equipped: Remove the front bumper cooling guide.

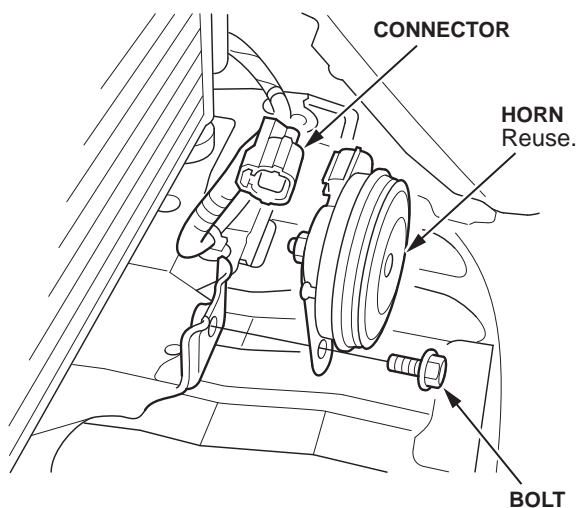
2013 models:



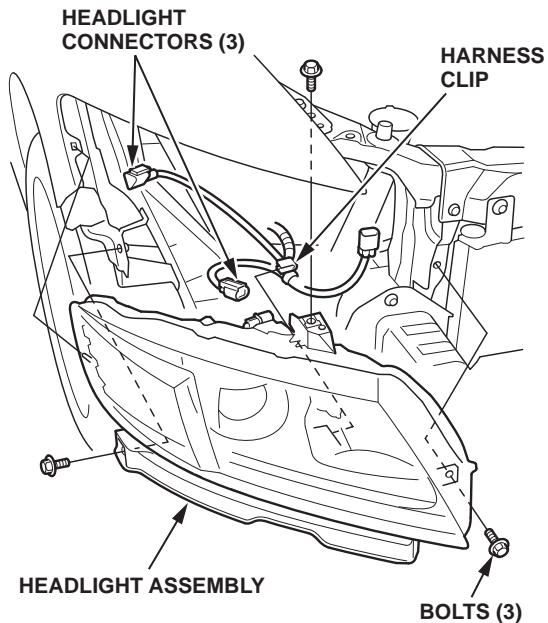
- 5.15 Remove the front bumper air guide.



6. Disconnect the low horn connector, remove the bolt and the horn.



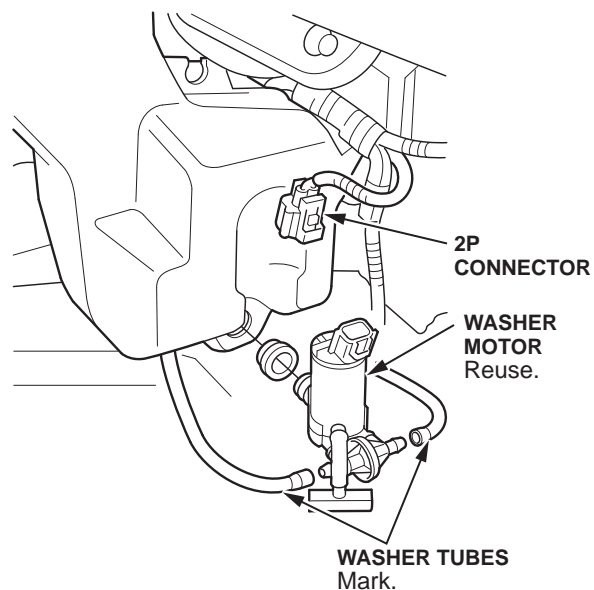
7. Remove the passenger side headlight.
- Remove the three bolts, and pull the headlight out slightly.
 - Remove the harness clip from the headlight housing, and disconnect the connectors from the bulb sockets.
- NOTE: Be careful not to scratch the headlight lens and the fender.



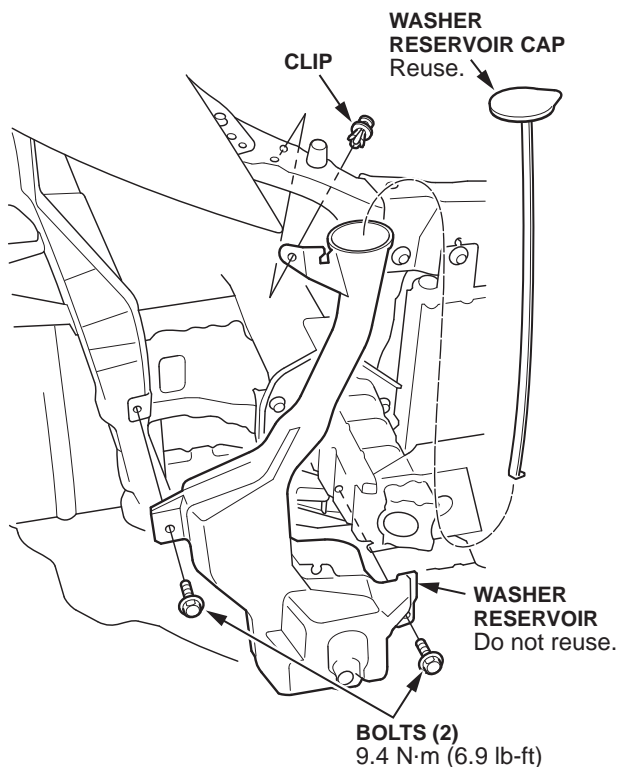
8. **Washer reservoir removal:**

- 8.1 Disconnect the connector from the washer motor. Mark the washer tubes left/right, then remove the washer tubes from the washer motor.

NOTE: Washer fluid will drain from the hoses and motor when you disconnect the hoses.

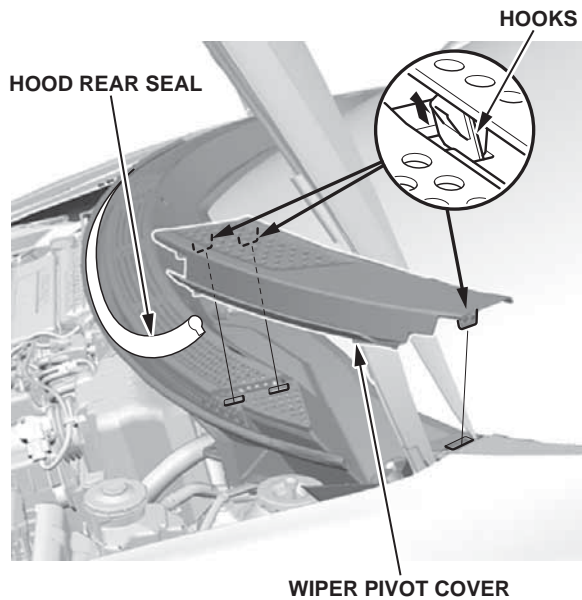


- 8.2 Remove the washer motor from the reservoir.
- 8.3 Remove the reservoir cap, the two bolts, and the clip, then remove the washer reservoir.

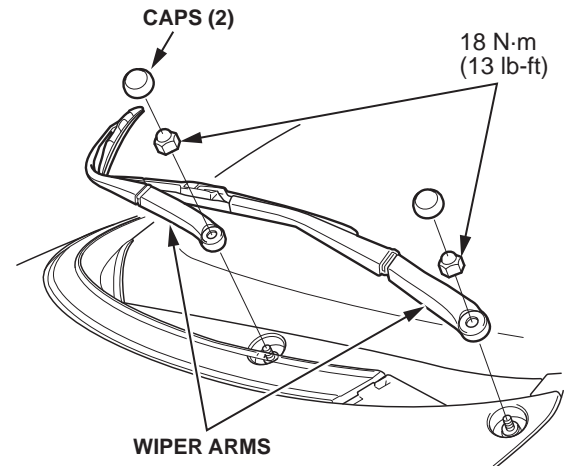


9. Cowl panel removal:

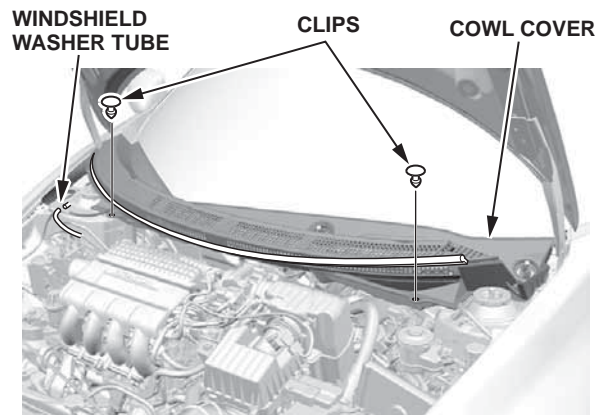
9.1 Remove the wiper pivot cover.



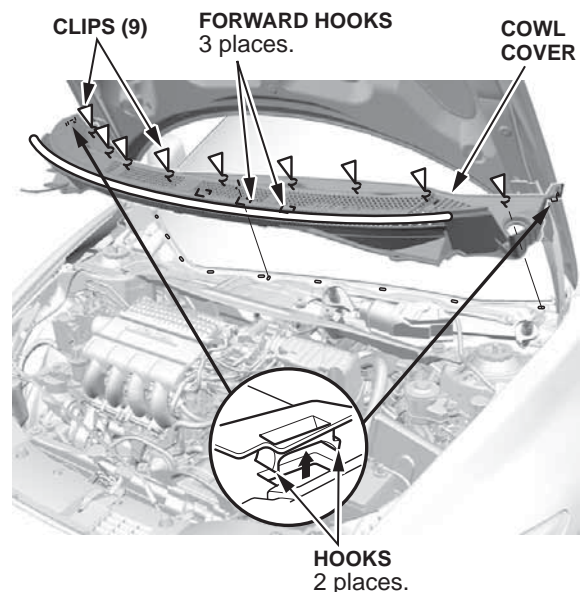
9.2 Remove the wiper arms.



9.3 Remove the clips from the cowl cover, then disconnect the windshield washer tube.

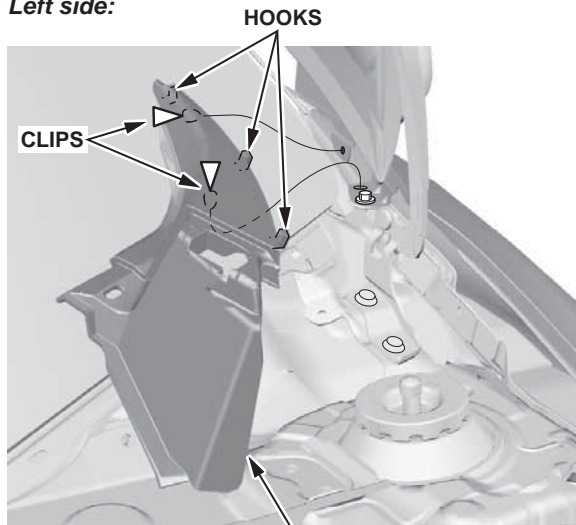


9.4 Remove the clips by pulling the windshield side of the cowl cover upward, then release the hooks by pulling the cowl cover forward. Then remove the cowl cover.

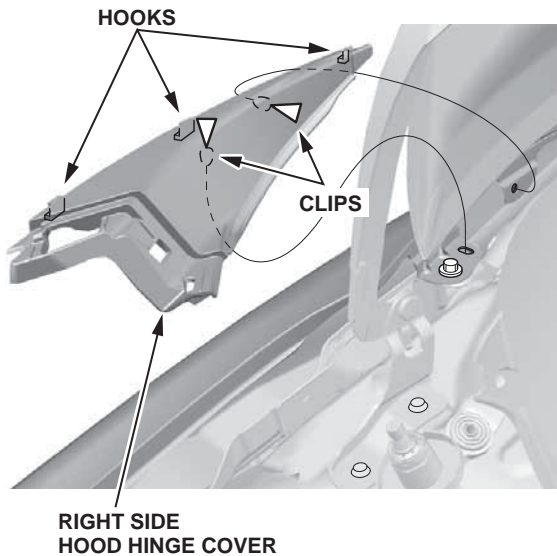


9.5 Remove the left and right hood hinge covers.

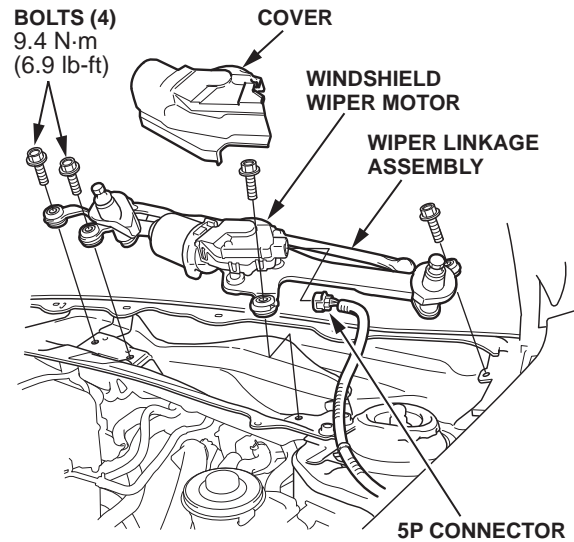
Left side:



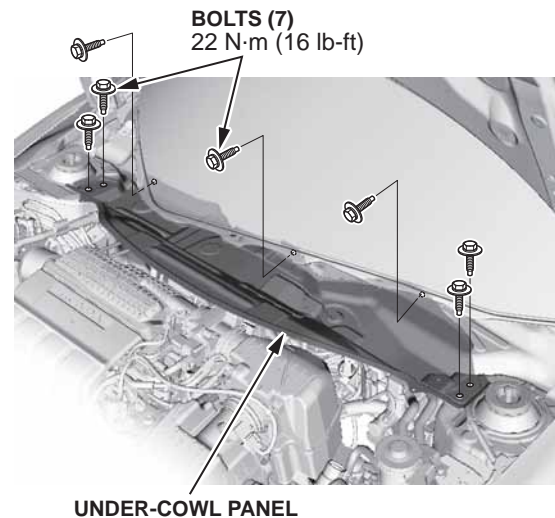
Right side:



9.6 Remove the windshield wiper motor assembly.

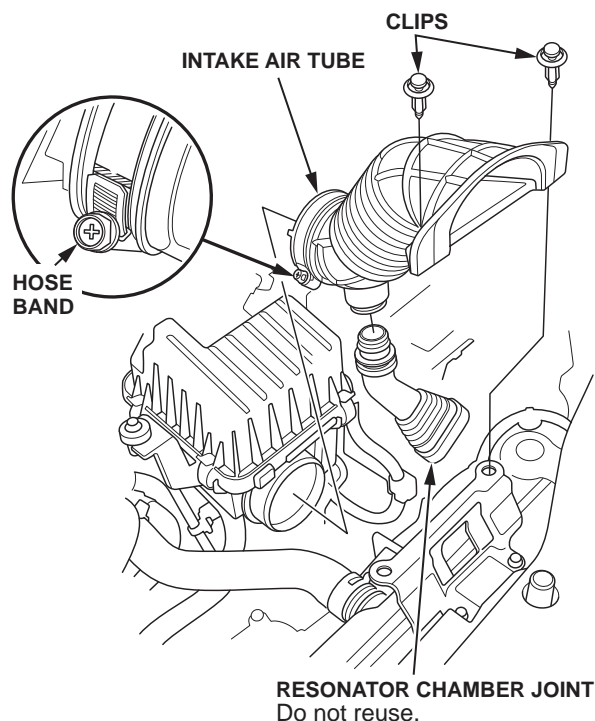


9.7 Remove the under-cowl panel.

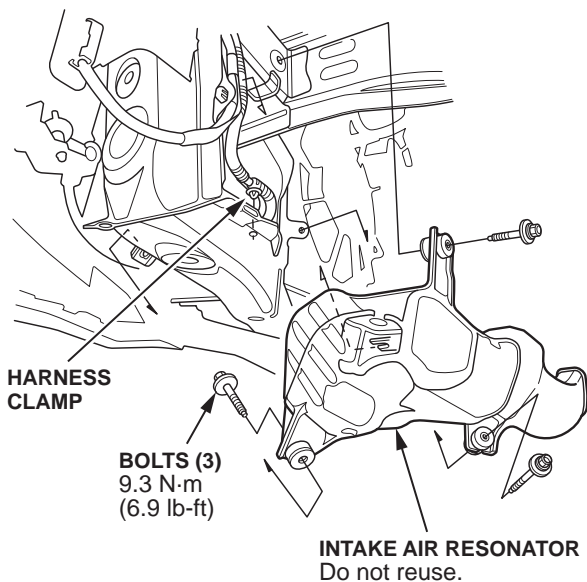


10. **Resonator and air cleaner removal:**

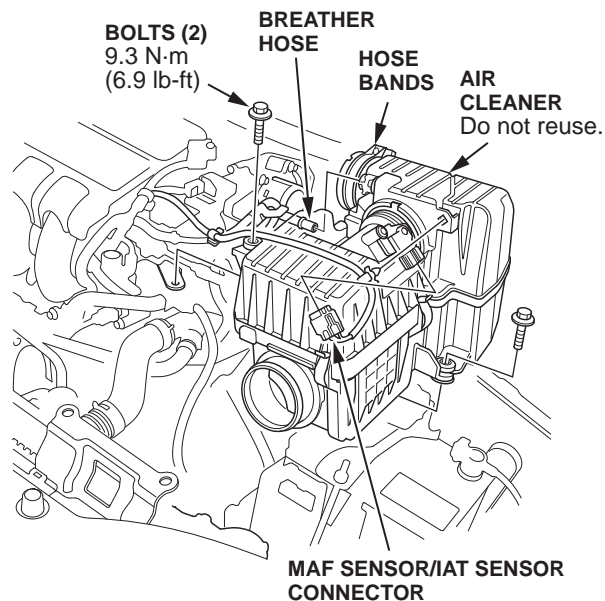
10.1 Remove the intake air tube and the resonator chamber joint.



10.2 Remove the harness clamp and the intake air resonator.



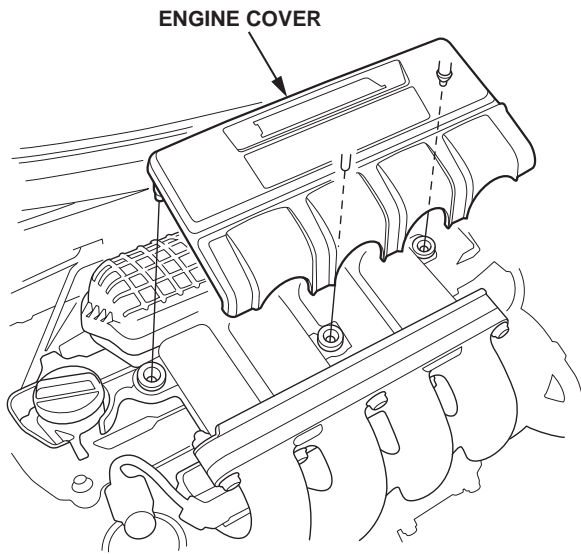
10.3 Disconnect the MAF sensor/IAT sensor connector, and remove the harness clips.



10.4 Disconnect the breather hose. Loosen the hose bands and remove the bolts, then remove the air cleaner from the throttle body and the intake air tube.

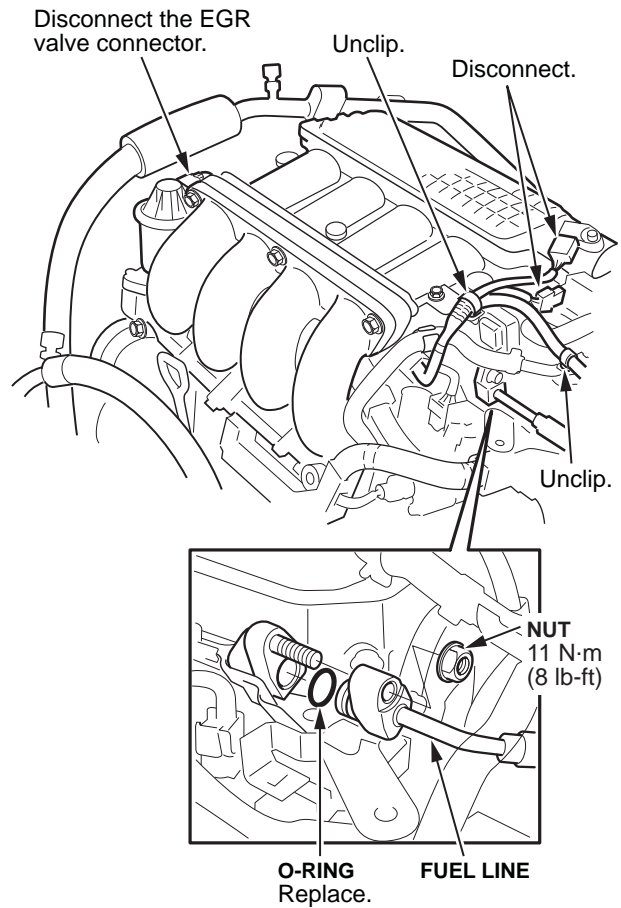
11. HPD injector installation:

11.1 Remove the engine cover.



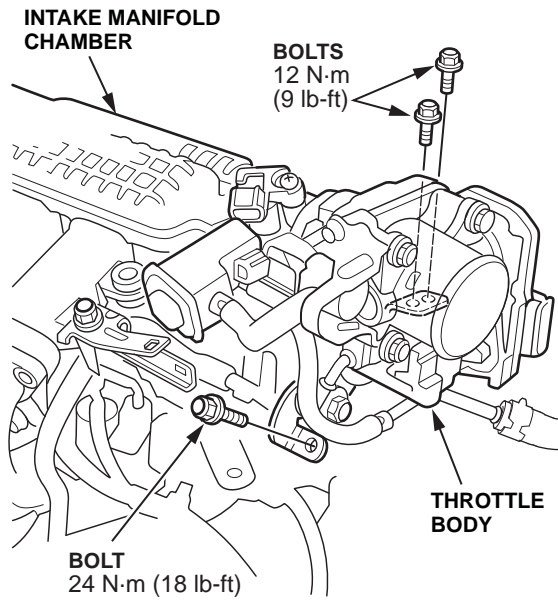
11.2 Disconnect the engine wire harness connectors, and remove the wire harness clamps from the intake manifold chamber:

- EGR valve connector
- Throttle actuator connector
- MAP sensor connector.

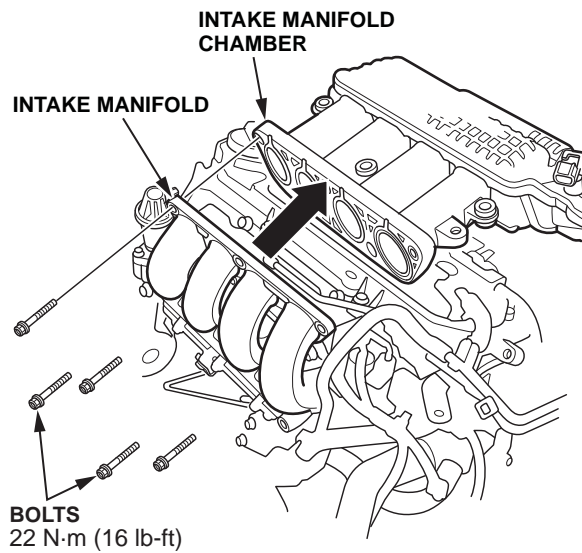


11.3 Relieve the fuel line pressure and remove the fuel line.

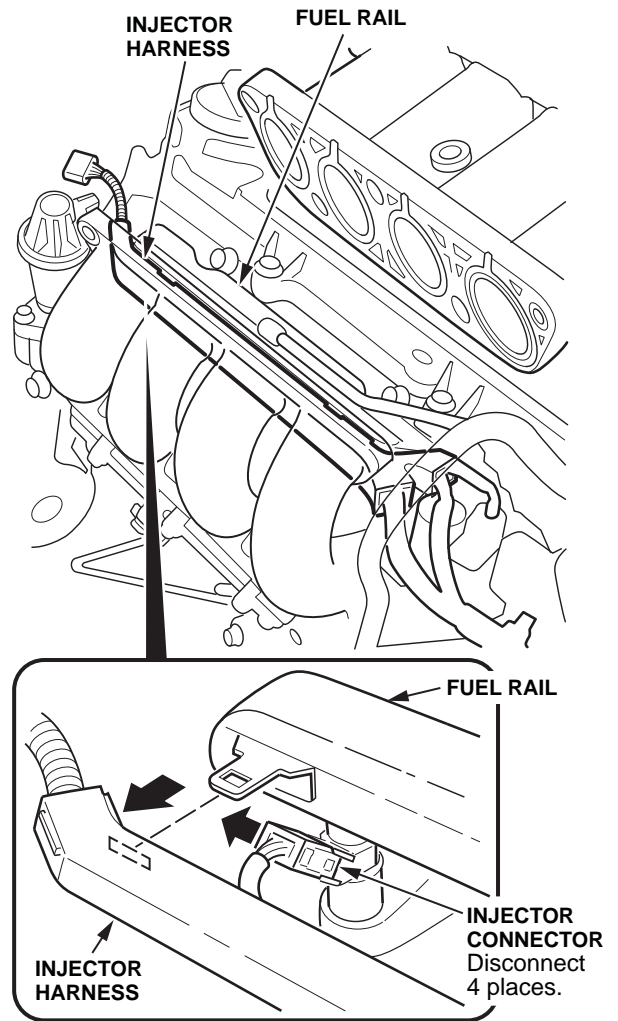
11.4 Remove the throttle body bracket bolts.



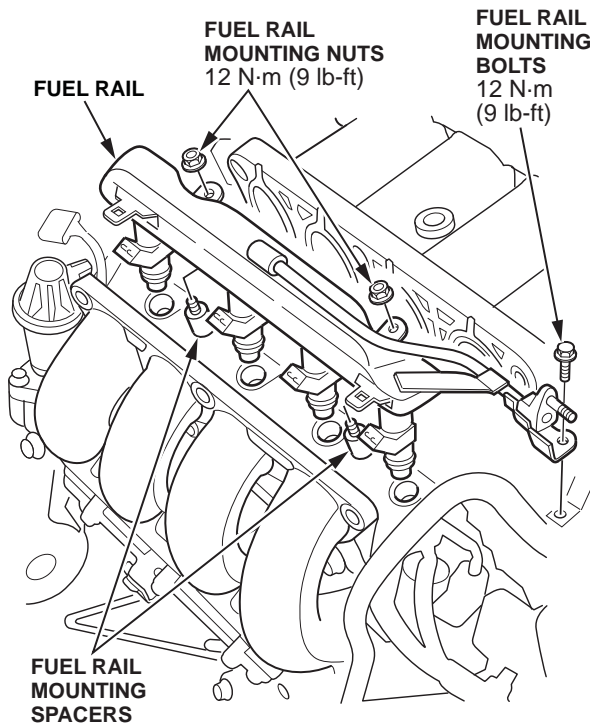
11.5 Remove the intake manifold chamber bolts, and push the chamber away from the manifold.



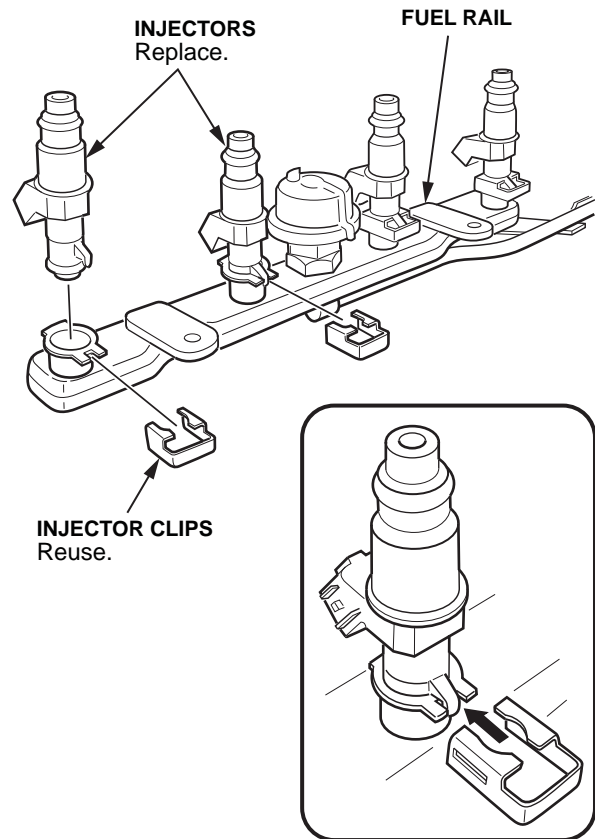
11.6 Disconnect the injector harness from the fuel rail.



- 11.6 Remove the fuel rail mounting nuts and the bolt from the fuel rail, then remove the injectors and the fuel rail together.

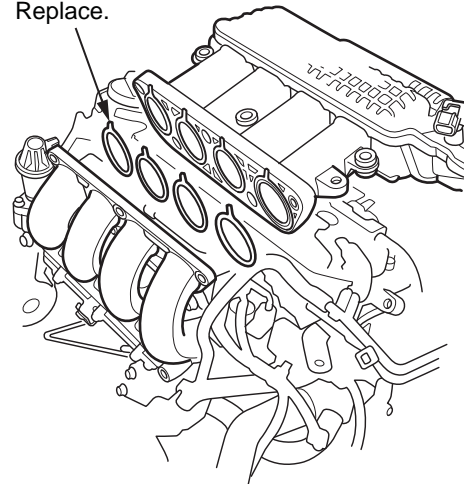


- 11.7 Remove the injectors from the fuel rail.



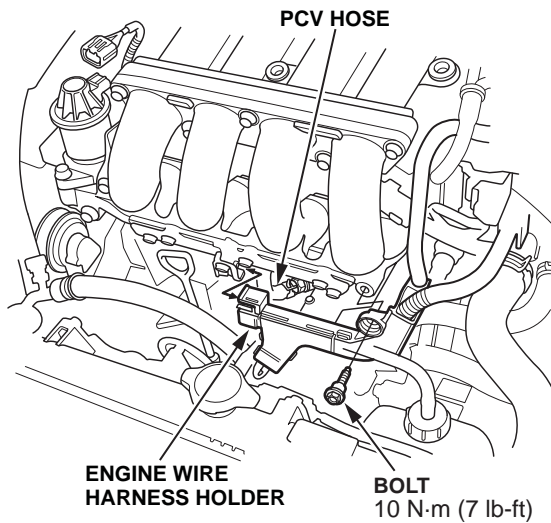
- 11.8 Coat the HPD Injector O-rings with clean engine oil, then install the injectors and fuel rail.
- 11.9 Reinstall the intake manifold chamber in the reverse order of removal.

INTAKE MANIFOLD CHAMBER GASKETS
Replace.

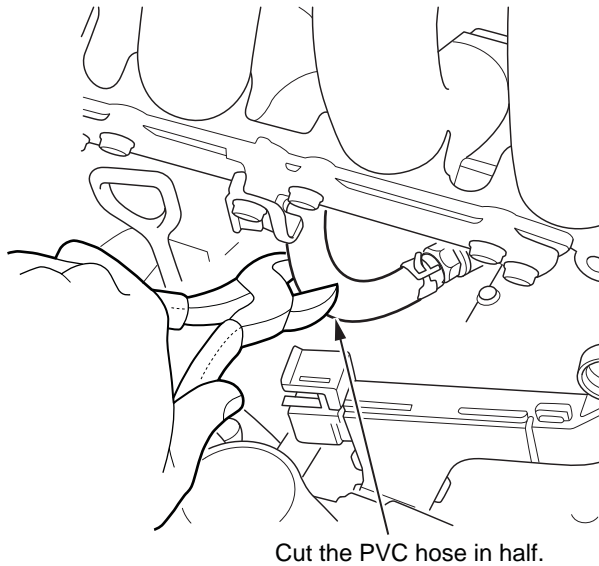


12. HPD secondary PCV valve installation:

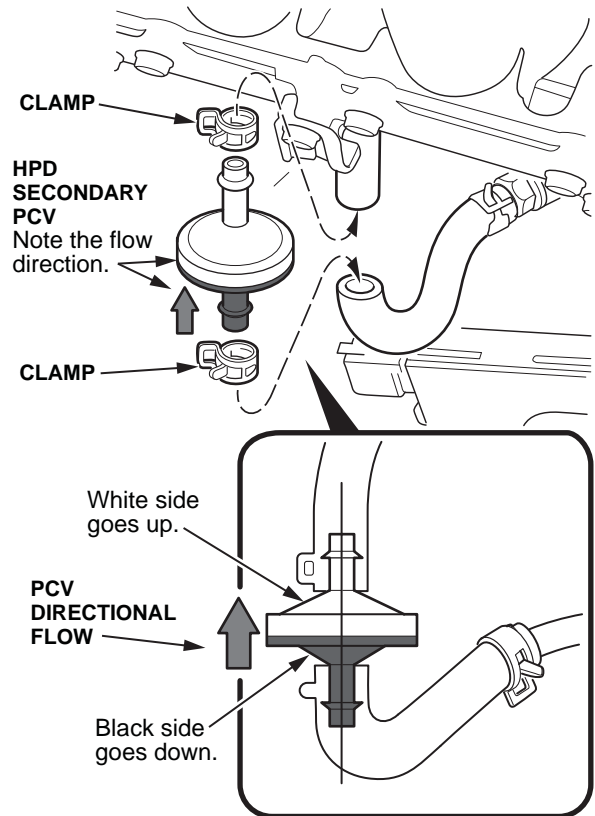
12.1 Remove the engine wire harness holder.



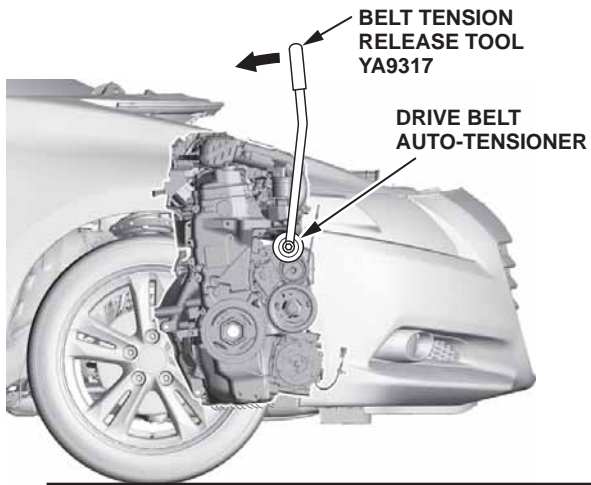
12.2 Cut the PCV hose halfway between the two hose clamps.



12.3 Install the HPD PCV valve with the white side pointing up and secure it with the clamps provided. Install the engine wire harness holder removed in step 12.1.

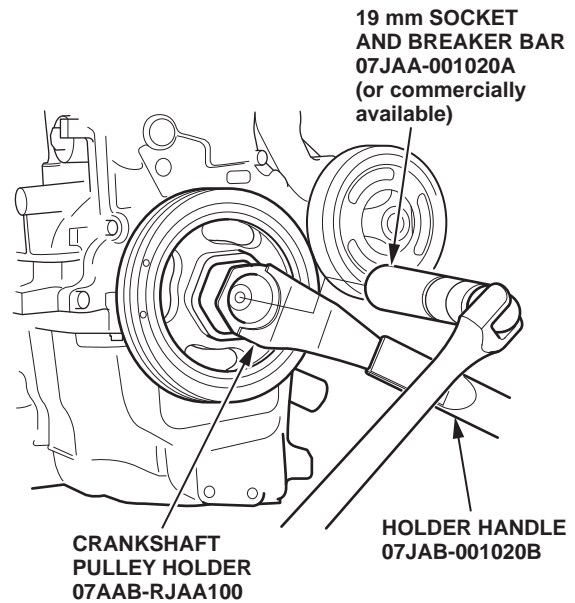


13. Release the drive belt auto-tensioner using the belt tension release tool (YA9317) in the direction shown, then remove the drive belt.

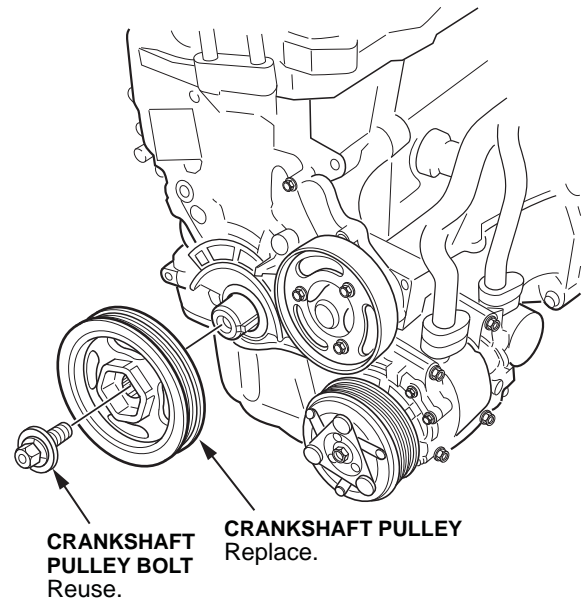


14. **HPD Crankshaft pulley installation:**

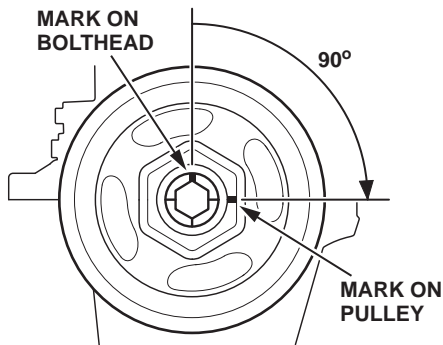
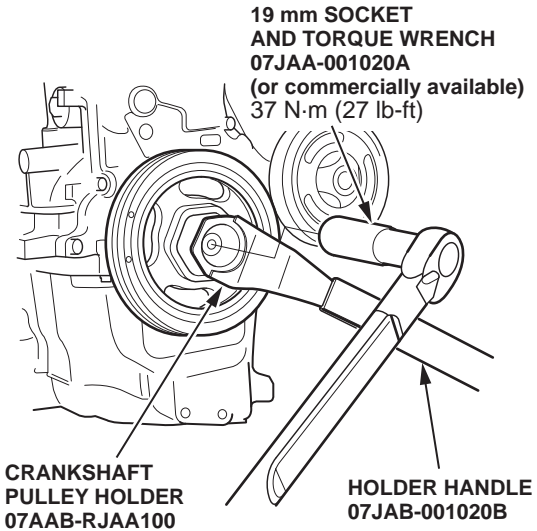
- 14.1 Hold the crankshaft pulley with the holder handle and the crankshaft pulley holder.



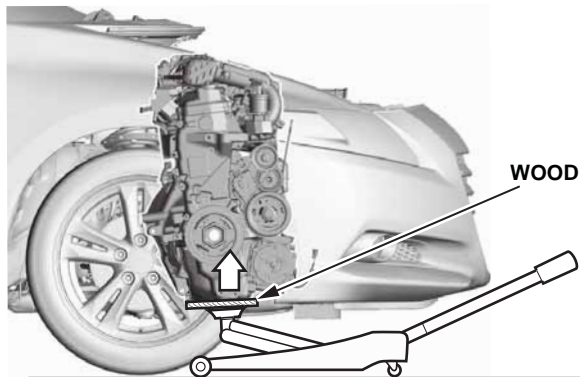
- 14.2 Remove the bolt with a 19 mm socket and a breaker bar, then remove the crankshaft pulley.



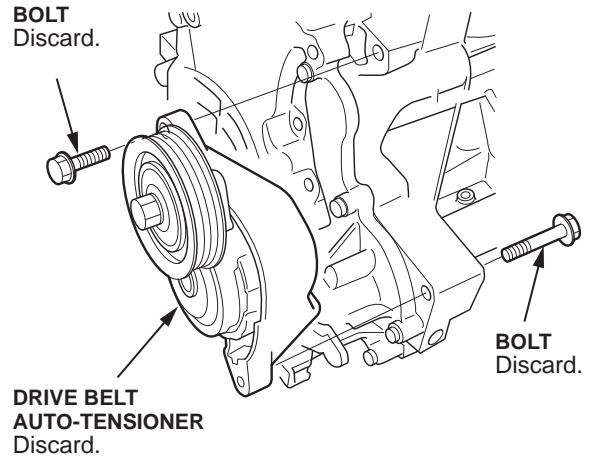
- 14.3 Clean the HPD crankshaft pulley, the crankshaft, the bolt, and the washer. Then lubricate the bolt and the washer with new engine oil, and install the crankshaft pulley. Torque the bolt to 37 N•m 27 lbf•ft with a torque wrench, and then tighten the bolt an additional 90 °.



15. Support the engine with a floor jack and a wood block under the oil pan.

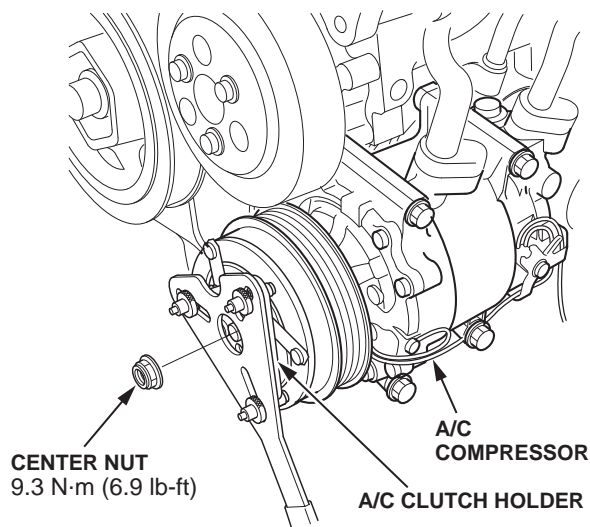


16. Remove the drive belt auto-tensioner.

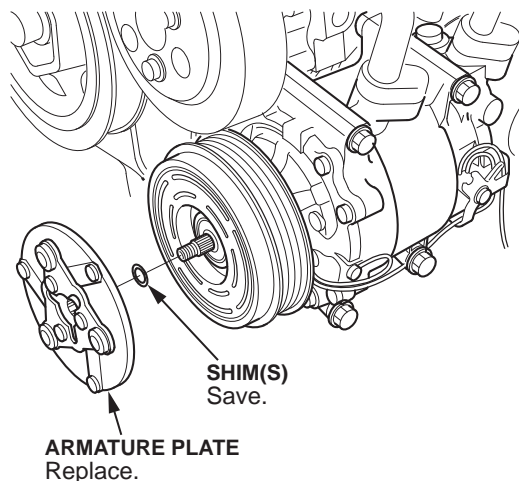


17. HPD compressor pulley installation:

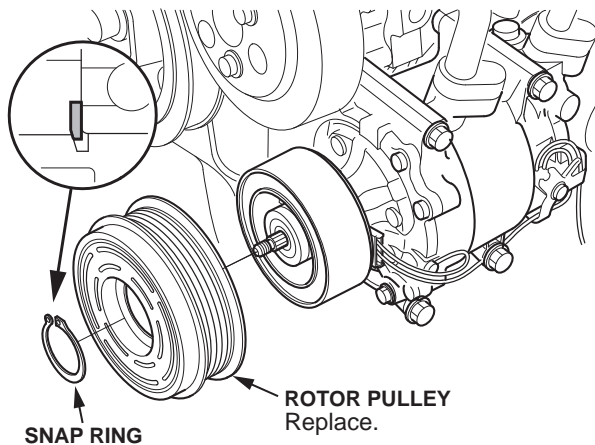
17.1 Remove the center nut while holding the armature plate with the A/C clutch holder.



17.2 Remove the armature plate and the shim.



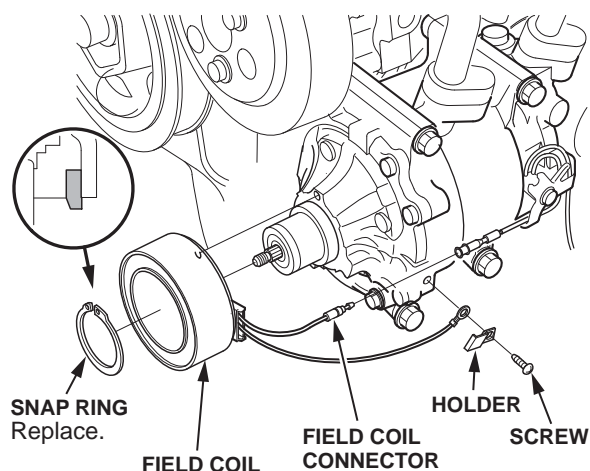
17.3 Remove the snap ring with snap ring pliers, then remove the rotor pulley. Be careful not to damage the rotor pulley and A/C compressor.



If the vehicle is a 2011 CR-Z, continue with step 18.4; Otherwise, go to step 18.5.

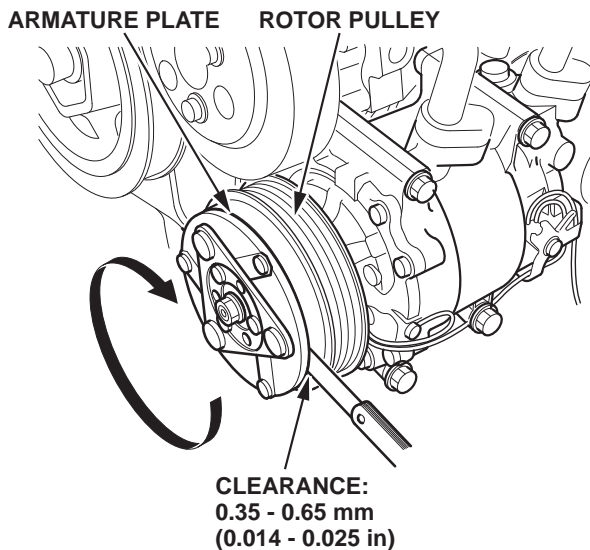
17.4 2011 models require converting the original field coil to a 2012 CR-Z field coil to allow pulley clearance. Remove the screw and holder, then disconnect the field coil connector. Remove the snap ring with snap ring pliers, then remove the field coil.

- Install the field coil with the wire side facing down, and align the boss on the field coil with the hole in the A/C compressor.



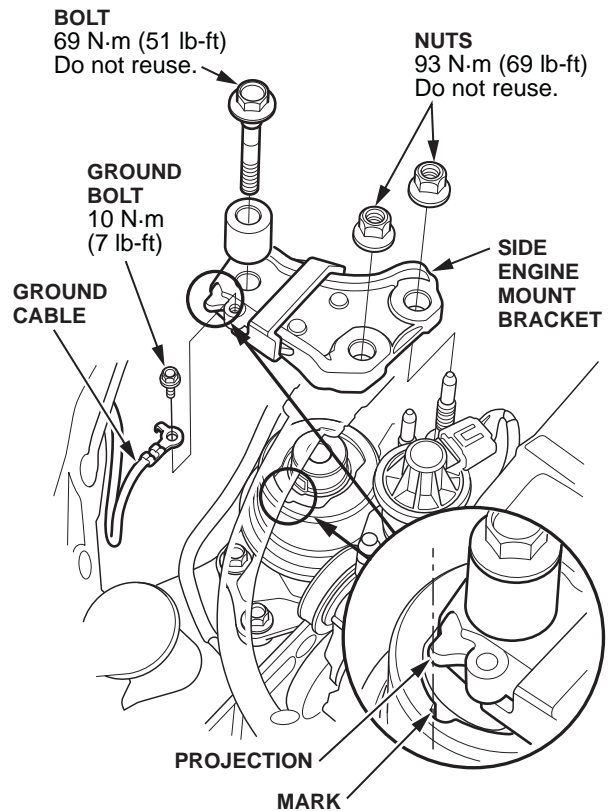
17.5 Reassemble the clutch in the reverse order of disassembly, using the HPD rotor pulley:

- Clean the rotor pulley and A/C compressor friction surfaces with contact cleaner or other non-petroleum solvent.
- Install new snap rings, note the installation direction, and make sure they are fully seated in the groove.
- Make sure that the rotor pulley turns smoothly after it is reassembled.
- Route and clamp the wires properly or they can be damaged by the rotor pulley.
- Measure the clearance between the rotor pulley and the armature plate all the way around. If the clearance is not within the specified limits, remove the armature plate and add or remove shims as needed to increase or decrease clearance.

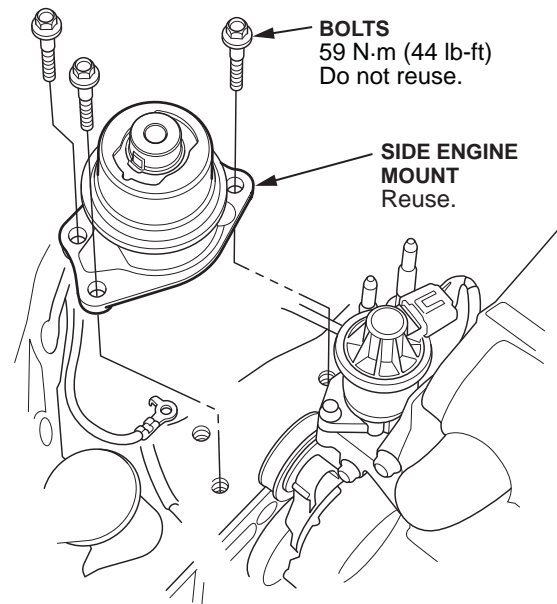


18. Side engine mount removal:

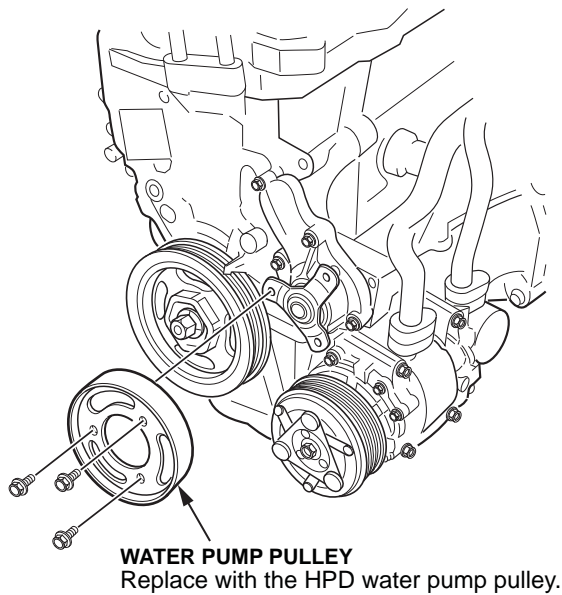
18.1 Remove the side engine mount ground cable, and the side engine mount bracket assembly.



18.2 Remove the side engine mount.



19. Lower the jack a few inches and remove the water pump pulley.

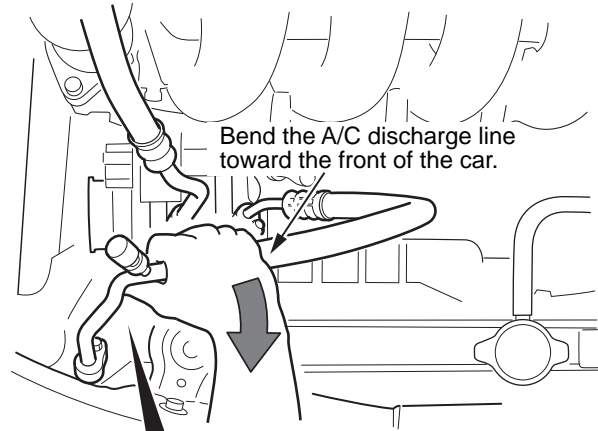


20. **HPD supercharger installation:**

- 20.1 Bend the A/C discharge hose toward the front of the vehicle, so that it is parallel with the radiator.

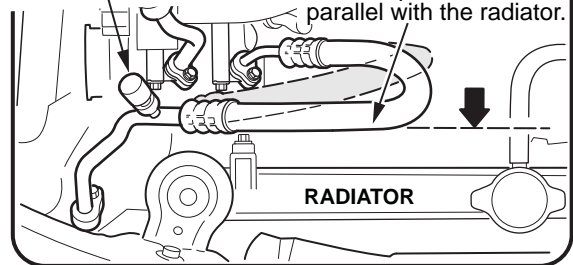
NOTE: Be careful not to damage the hose while bending

VIEW LOOKING STRAIGHT DOWN:



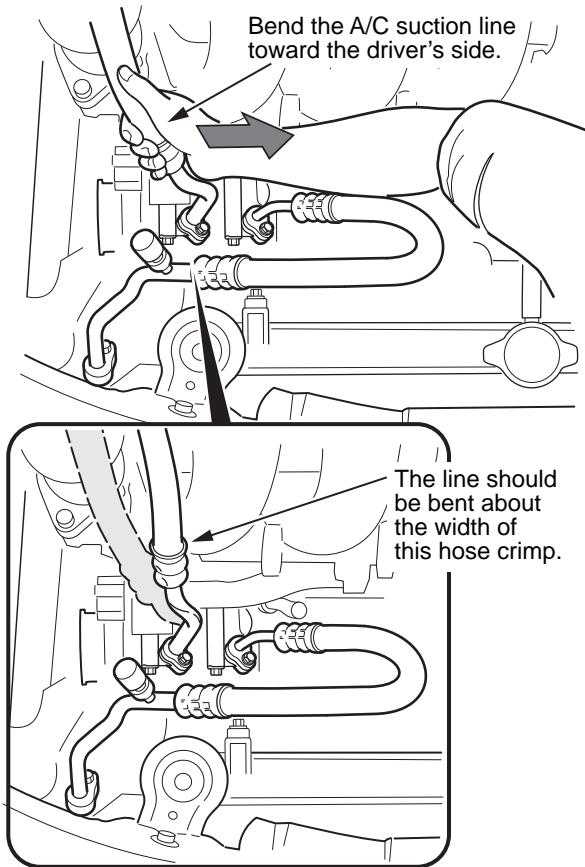
Bend the A/C high side fitting toward the front of the car.

The line should be bent so the top of the line is parallel with the radiator.

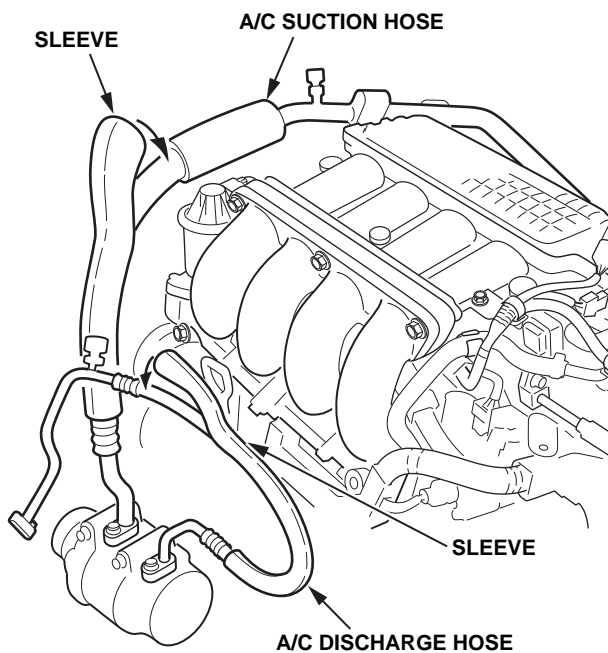


20.2 Bend the A/C suction hose as shown.

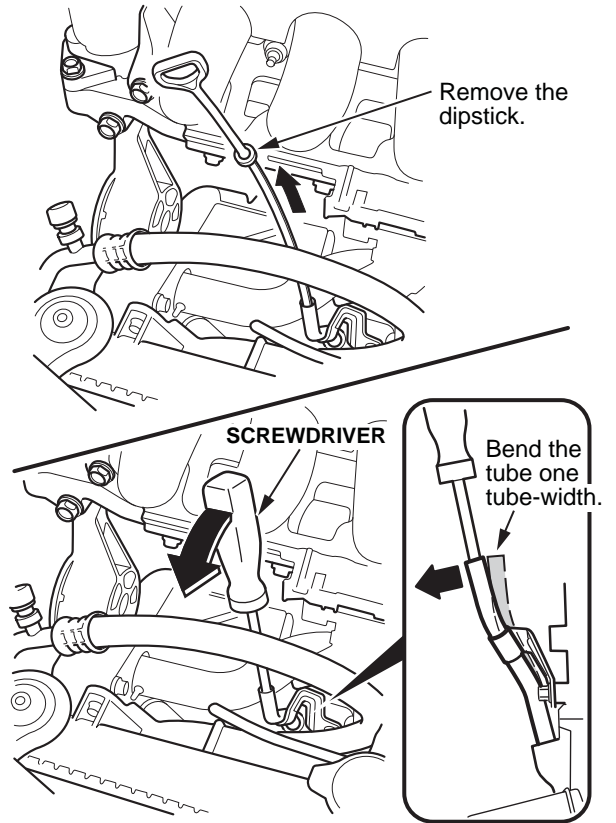
VIEW LOOKING STRAIGHT DOWN:



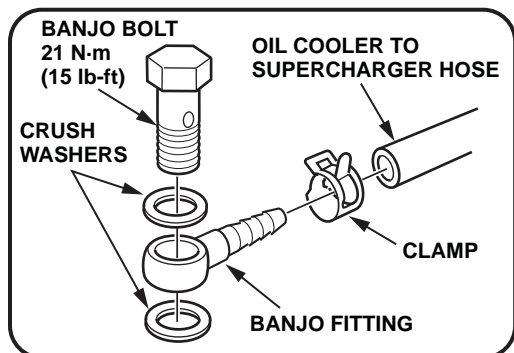
20.3 Install the protective sleeves on the A/C discharge hose and the A/C suction hose.



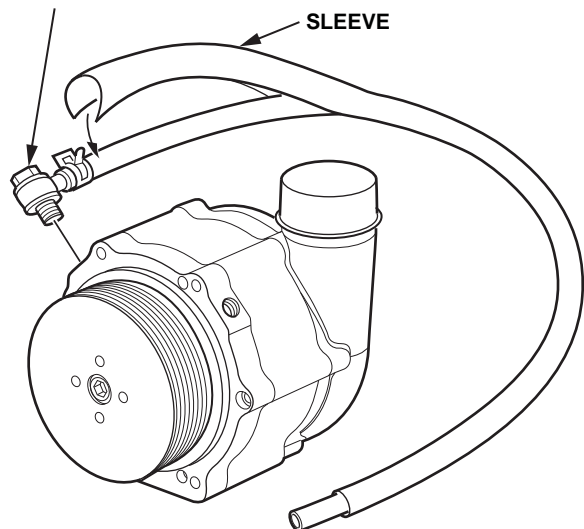
20.4 Using a Phillips screwdriver, bend the dipstick tube toward the front, and then toward the driver's side of the vehicle.



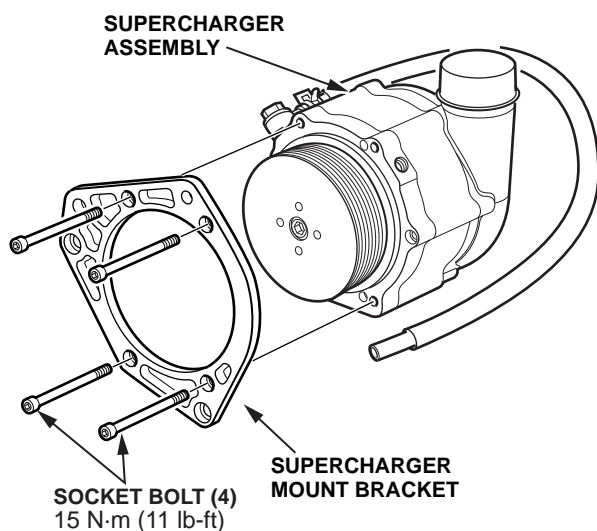
20.5 Install the supercharger oil cooler hose using a banjo bolt, banjo fitting, crush washers, and clamp. Align the hose 90° from the front of the supercharger, and torque the banjo bolt, then install the protective sleeve.



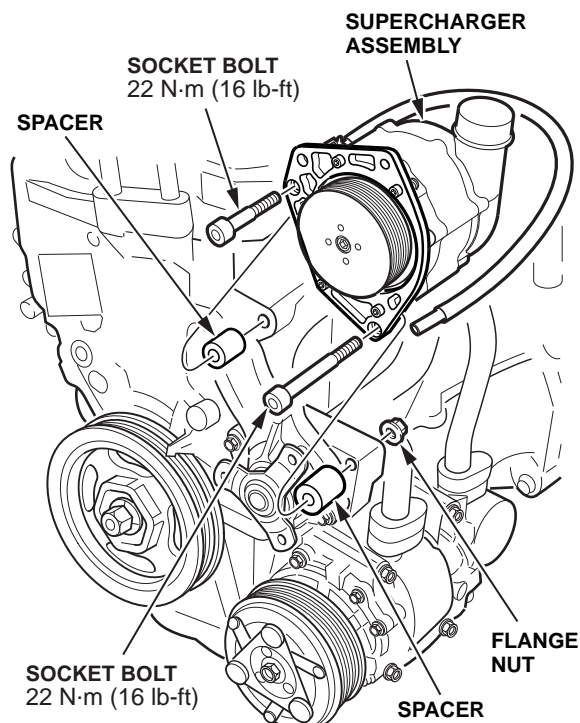
OIL COOLER TO SUPERCHARGER HOSE ASSEMBLY



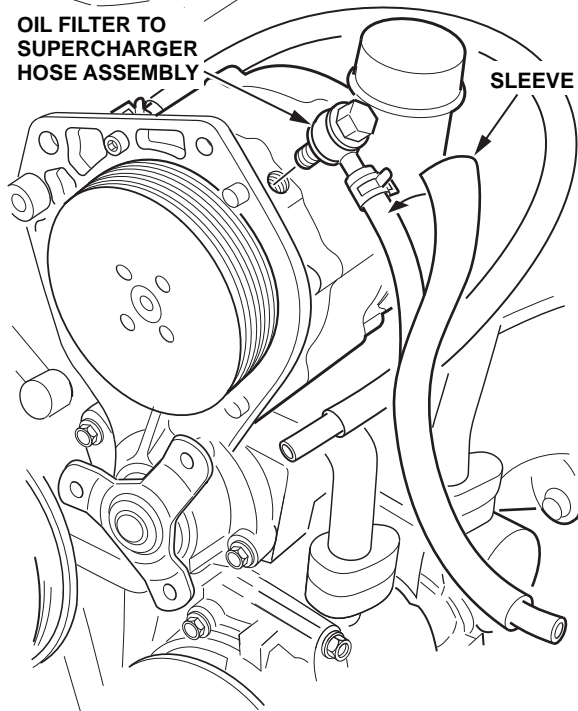
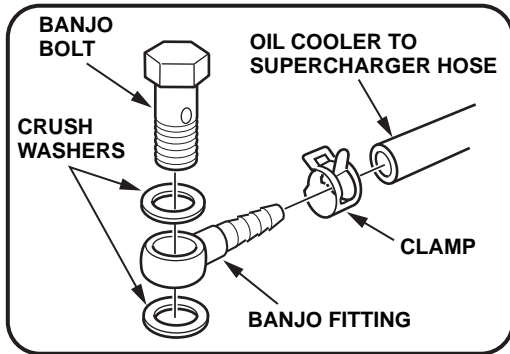
20.6 Align the supercharge bracket as shown, and mount the bracket to the supercharger.



20.7 Attach the supercharger to the engine using the two spacers, tow bolts, and one nut.

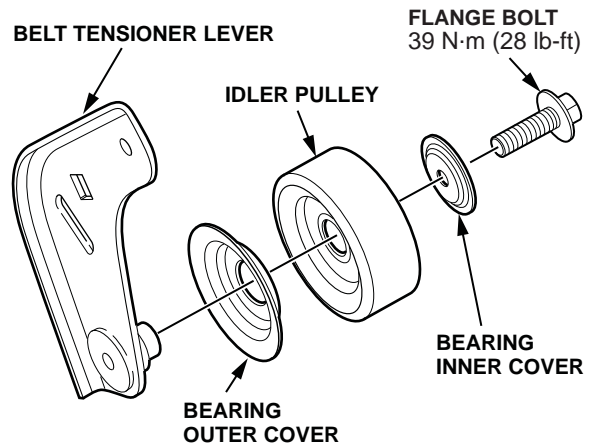


- 20.8 Loosely attach the supercharger oil filter hose using a banjo bolt, banjo fitting, crush washers and clamp. Align the hose parallel to the front of the supercharger, then install the protective sleeve.

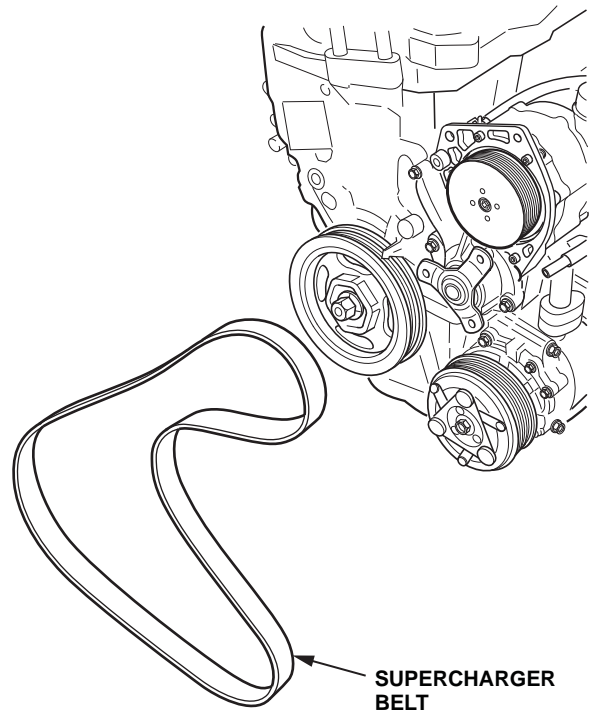


21. **HPD idler pulley assembly installation:**

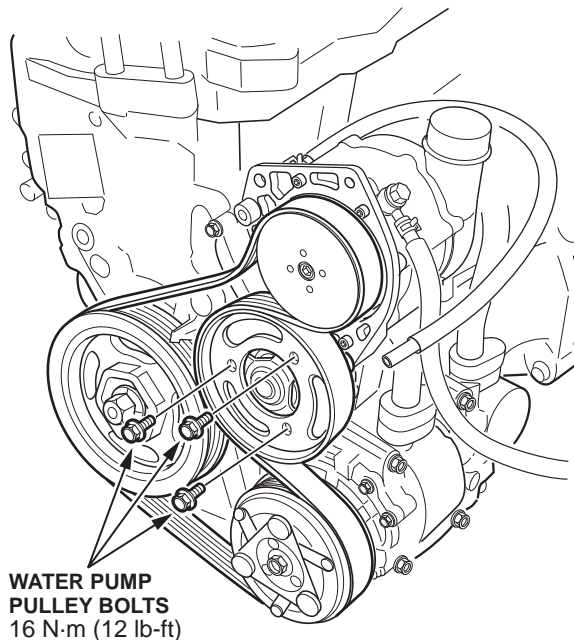
- 21.1 Install the HPD idler pulley on the belt tensioner lever.



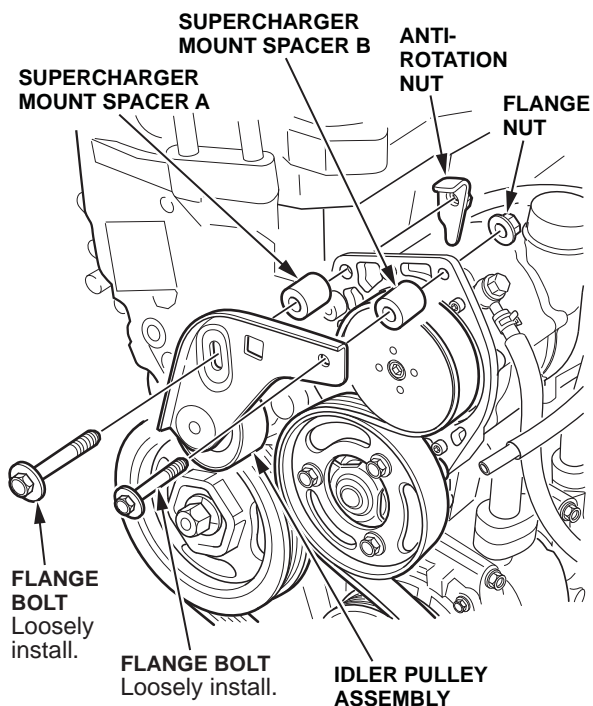
- 21.2 Install the HPD drive belt as shown.



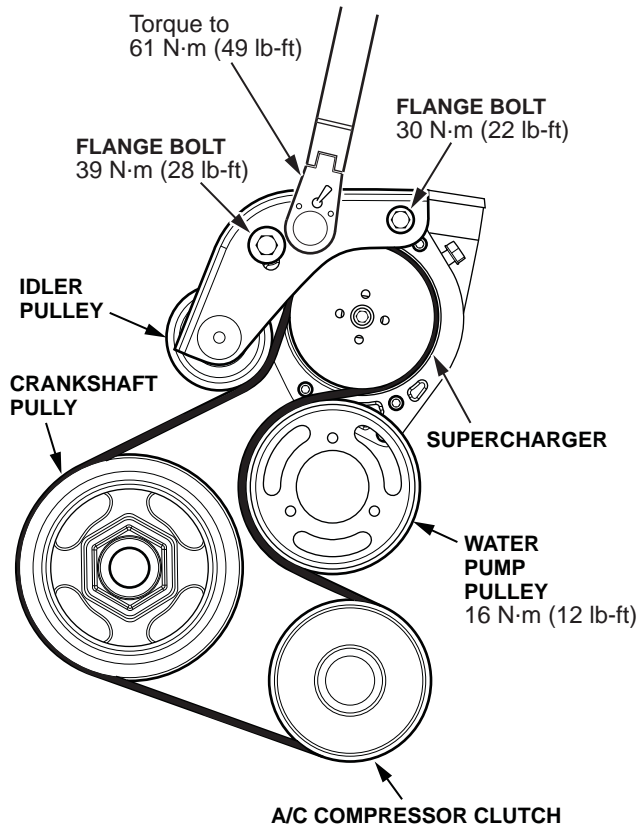
21.3 Install the water pump pulley.



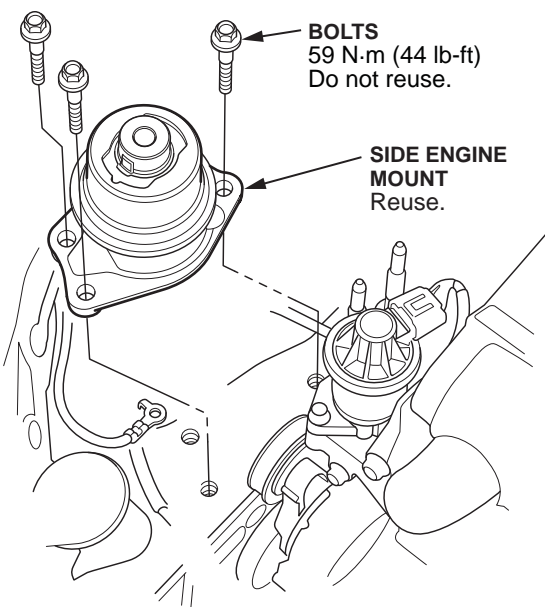
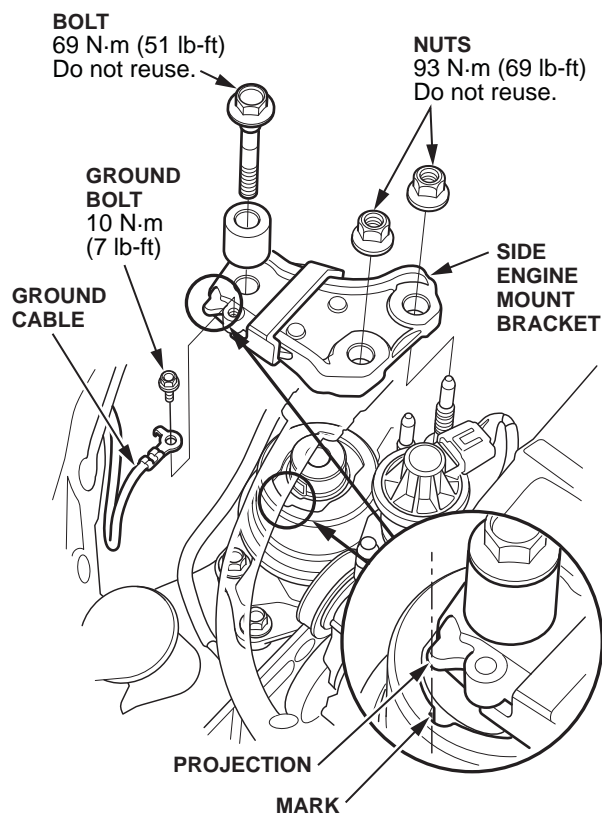
21.4 Loosely install the HPD idler pulley assembly.



21.5 Using a beam torque wrench, tighten the drive belt to 61 N·m (49 lb-ft), then torque the HPD idler pulley assembly flange bolts.

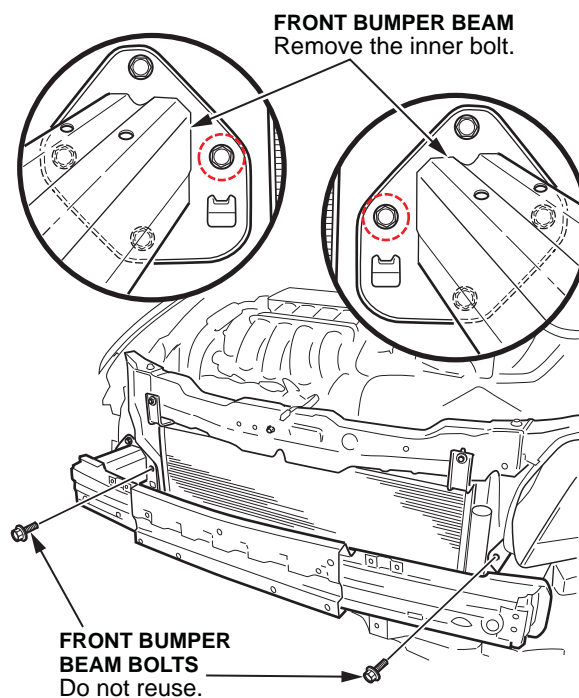


22. Install the side engine mount in the reverse order of removal.

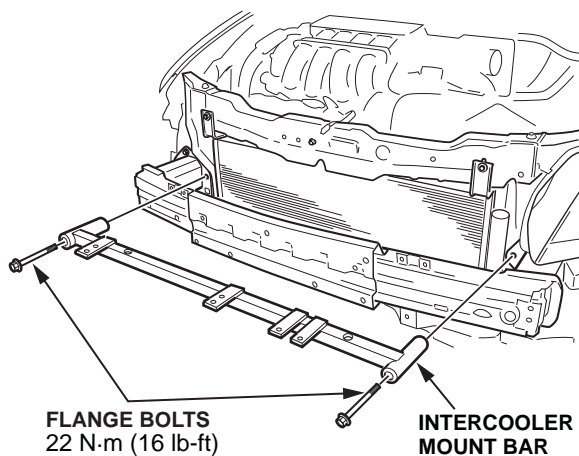


23. **HPD intercooler installation:**

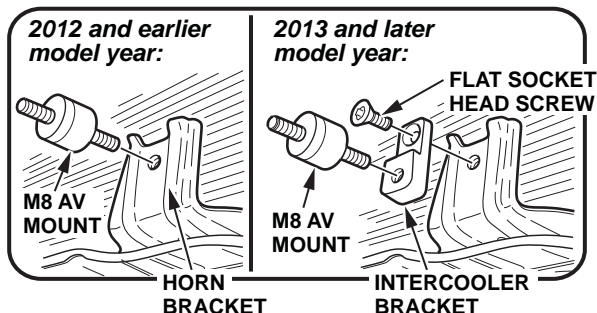
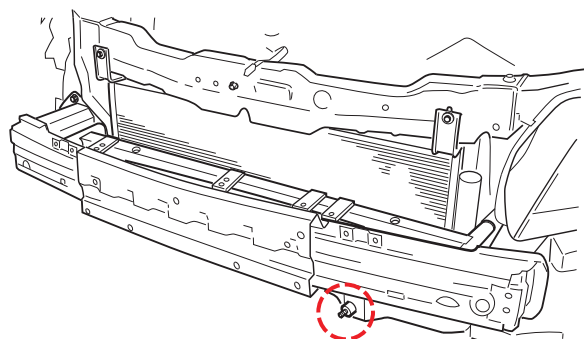
23.1 Remove the front bumper beam bolts.



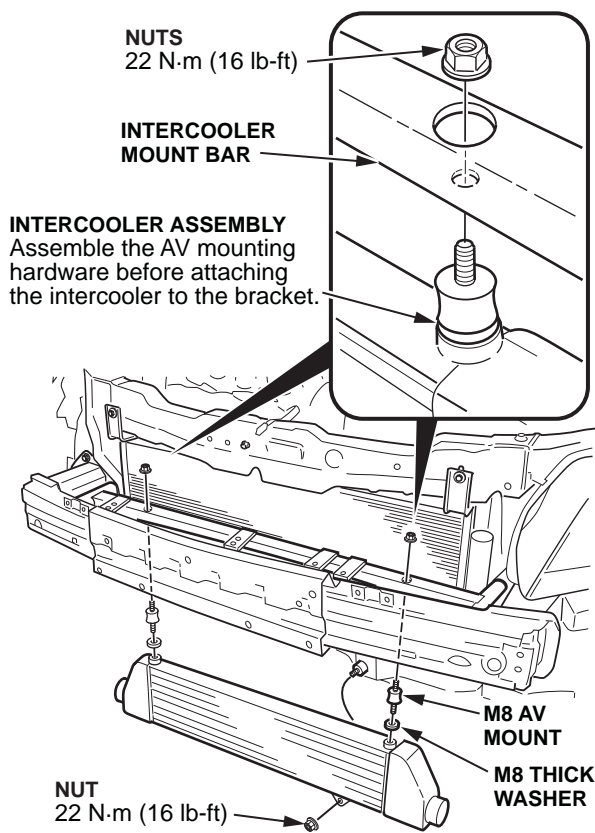
23.2 Install the HPD intercooler mounting bar using the two flange bolts.



23.3 Install the HPD intercooler lower mount.

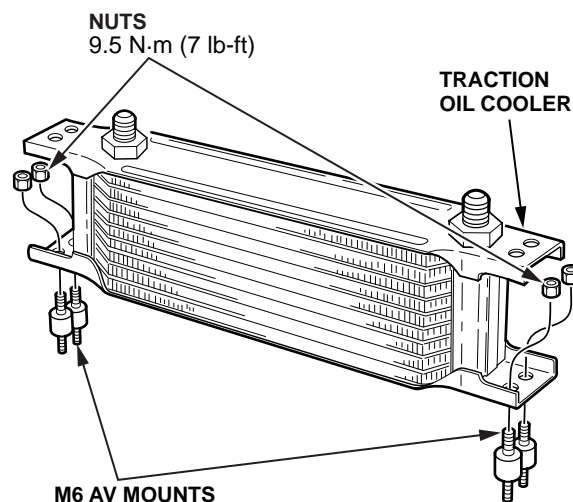


23.4 Install the AV mount, and washers on the HPD intercooler, then mount the intercooler to the intercooler mounting bar.

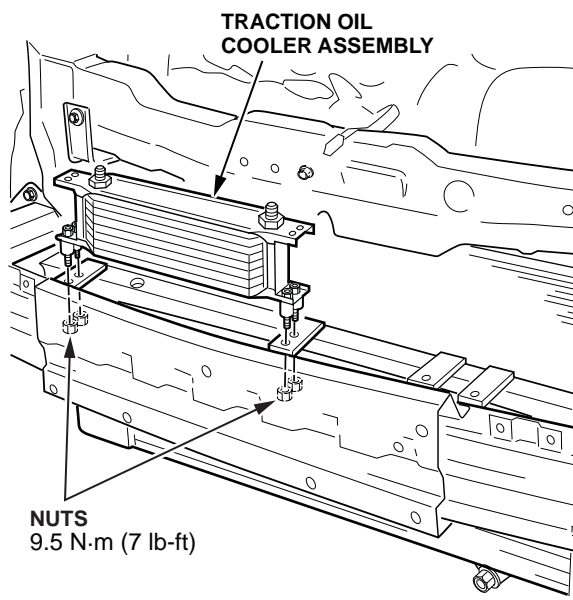


24. HPD traction oil cooler installation:

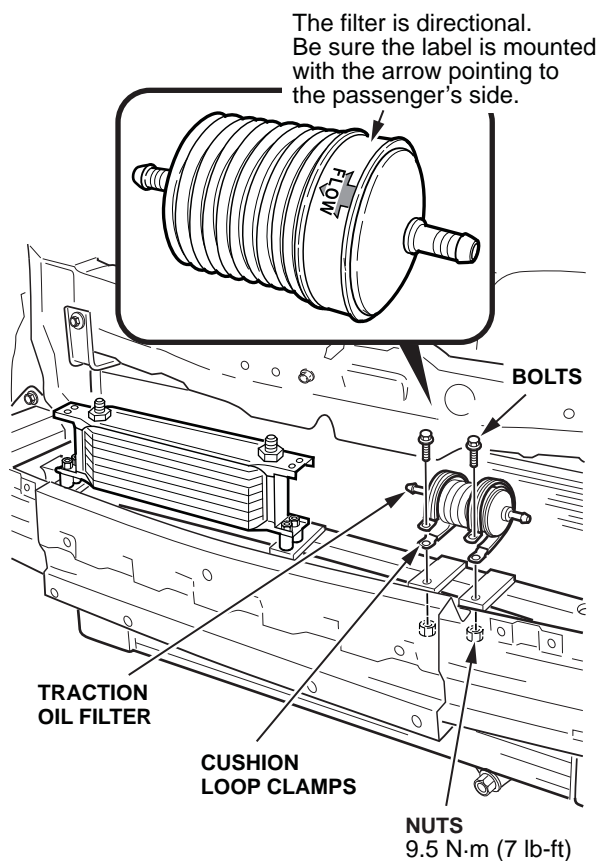
24.1 Attach the M6 AV mounts to the traction oil cooler.



24.2 Mount the HPD traction oil cooler to the intercooler mounting bar.

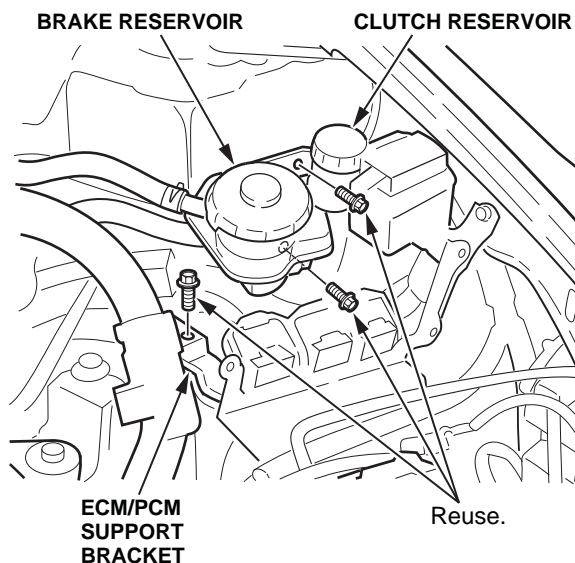


- 24.3 Mount the HPD traction oil filter to the intercooler mounting bar.

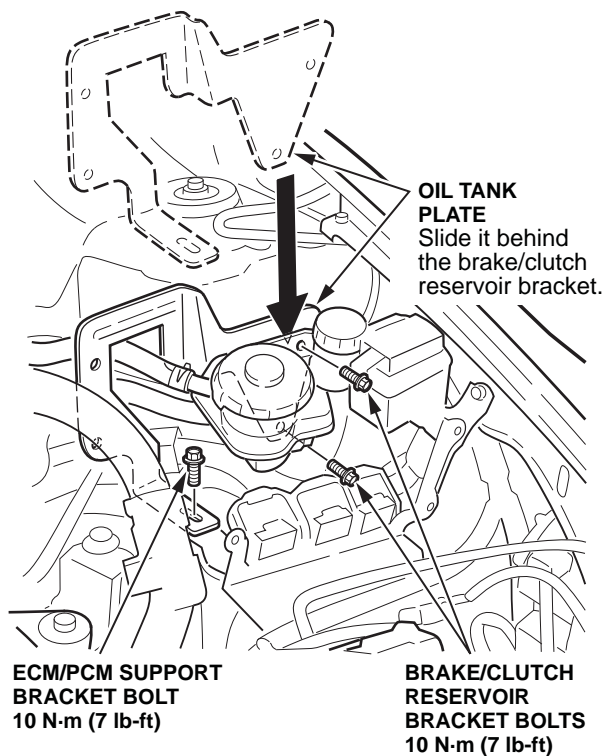


25. **HPD traction oil tank installation:**

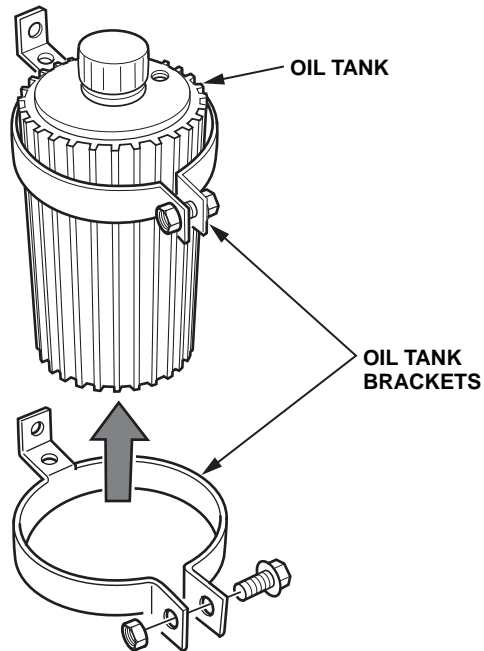
- 25.1 Remove the ECM/PCM and brake/clutch reservoir bolts.



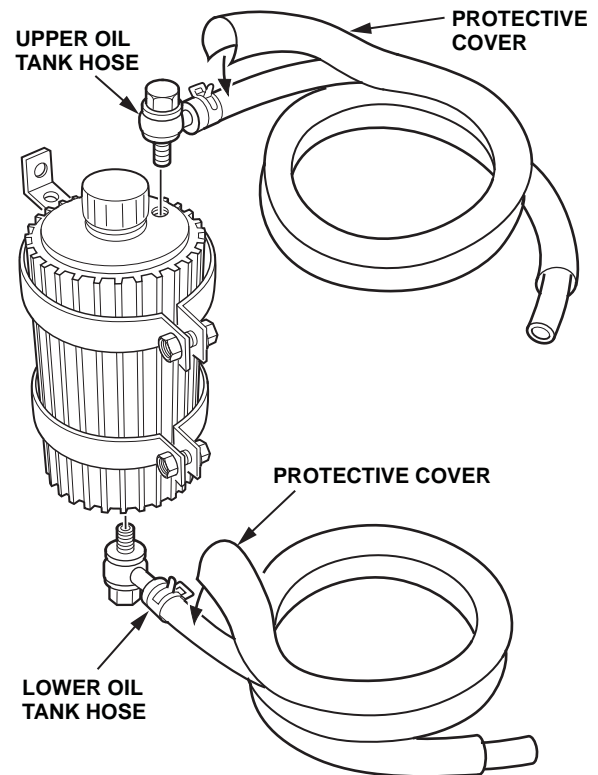
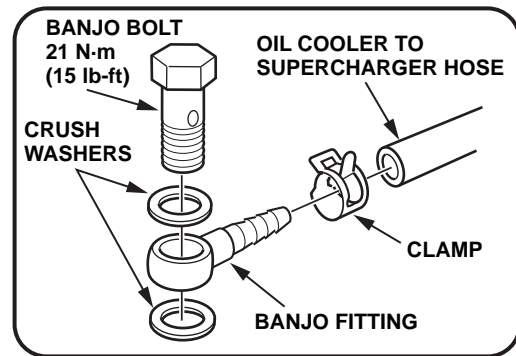
- 25.2 Slide the oil tank plate behind the brake/clutch reservoir bracket and secure the plate using the bolts removed earlier.



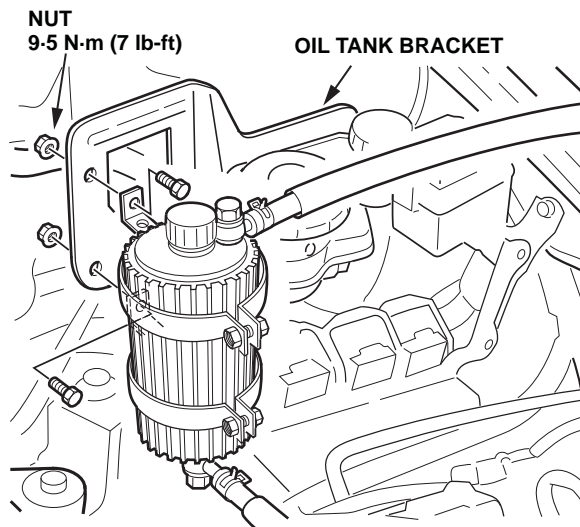
25.3 Loosely attach the oil tank clamps.



25.4 Attach and position the upper and lower oil tank hoses as shown. Then cover the hoses with protective sleeves.

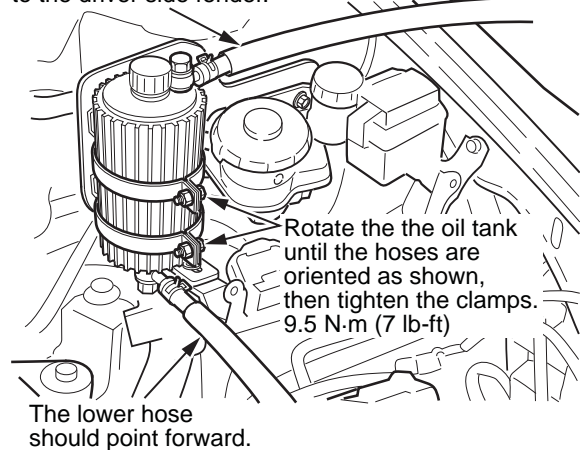


25.5 Attach the oil tank to the oil tank bracket.

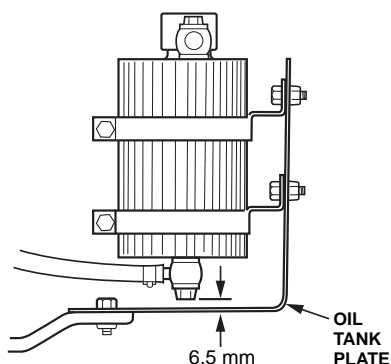


25.6 Rotate the oil tank until the upper oil hose points to the driver side fender, and the lower oil hose point to the front of the vehicle. Then tighten the oil tank clamps.

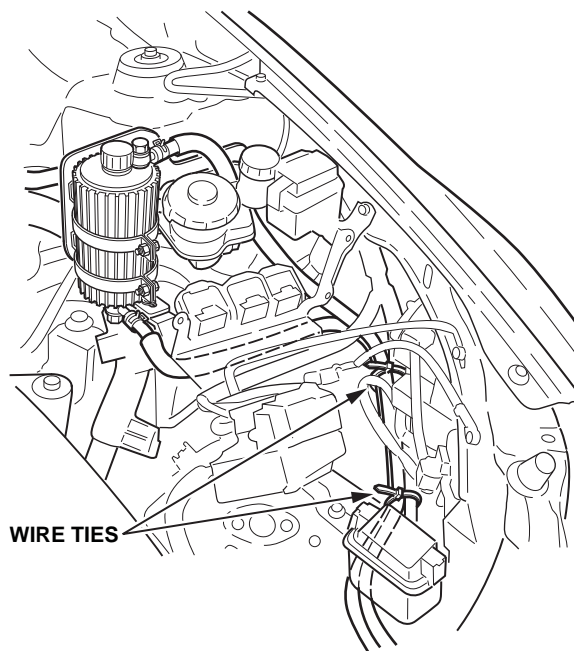
The upper hose should point to the driver side fender.



Note: Allow 6.5 mm between the lower hose banjo bolt and the oil tank plate.



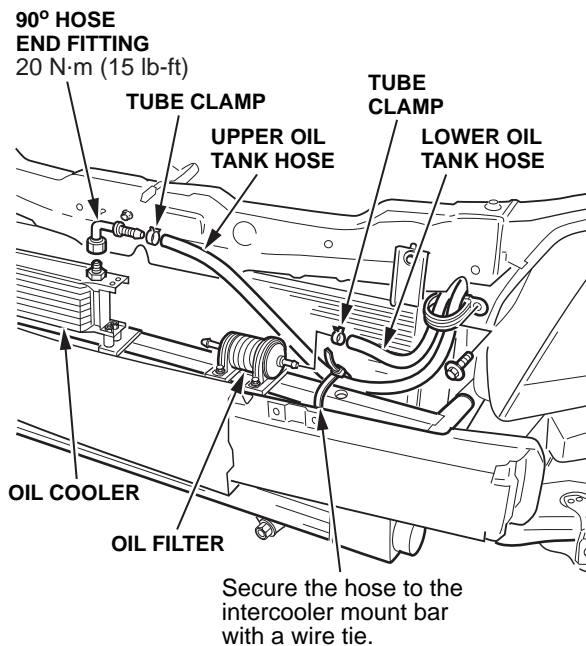
25.7 Route the oil tank hoses as shown, and secure the hoses to the vehicle with two wire ties.



25.8 Then tighten the upper and lower oil tank hoses.

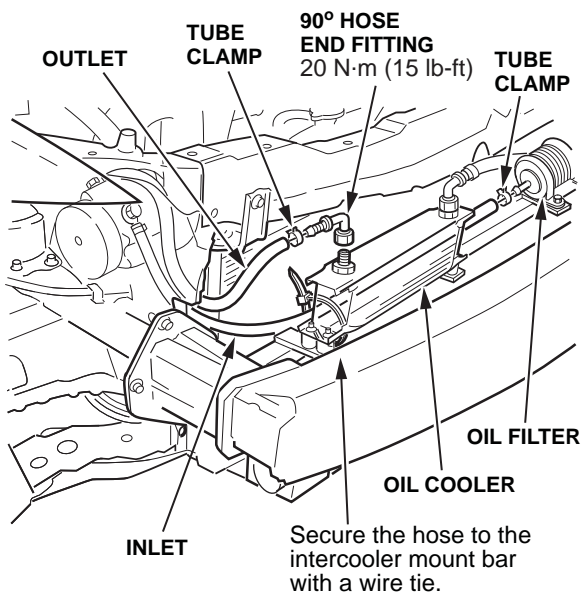
26. HPD traction oil hose installation:

26.1 Route the upper and lower oil tank hoses through the core support, and secure the hoses to the vehicle with a loop clamp.



26.2 Connect lower oil tank hose to the filter, and the upper oil tank hose to the cooler. Secure the upper oil tank hose with one wire tie.

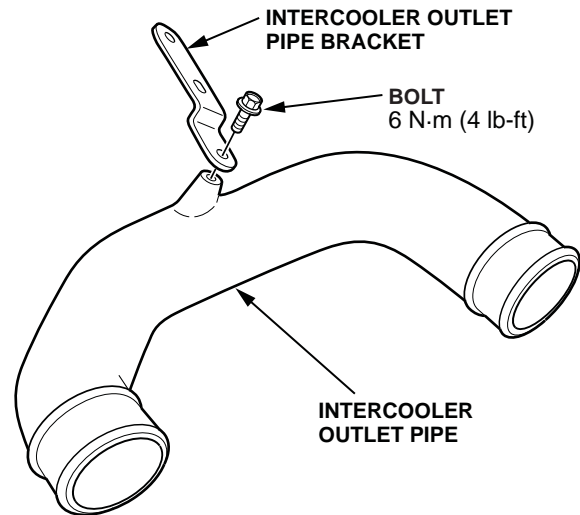
26.3 Route the supercharger oil hoses through the core support, and connect the outlet hose to the cooler.



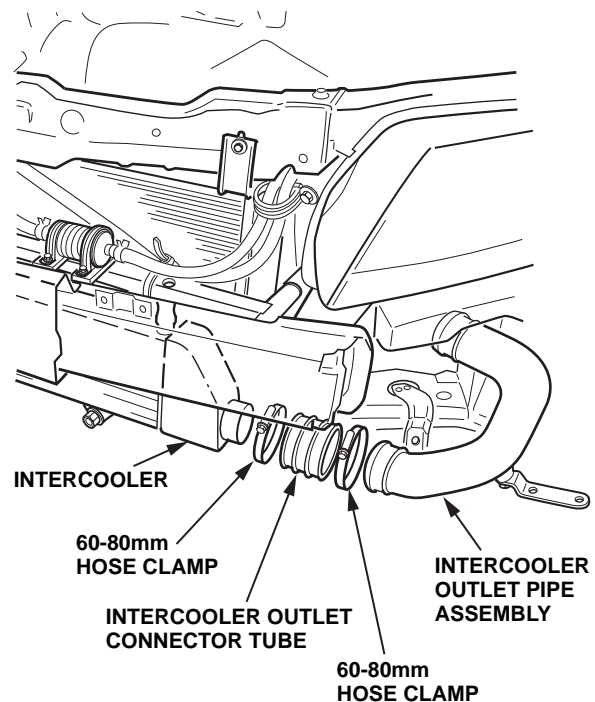
26.4 Route the inlet hose behind the cooler and connect it to the filter. Secure the inlet hose with one wire tie.

27. HPD intercooler pipe installation:

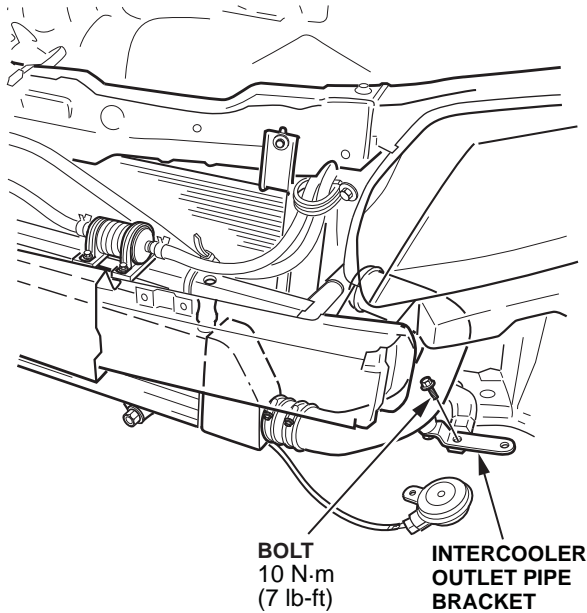
27.1 Attach the intercooler outlet pipe bracket to the intercooler outlet pipe.



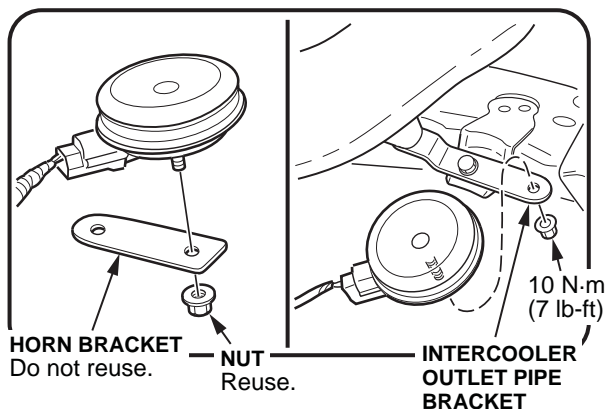
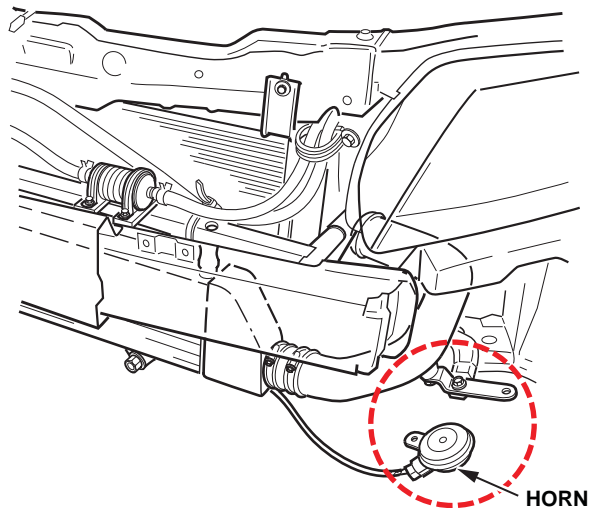
27.2 Attach the intercooler outlet pipe assembly to the intercooler using two hose clamps and the intercooler outlet connector tube.



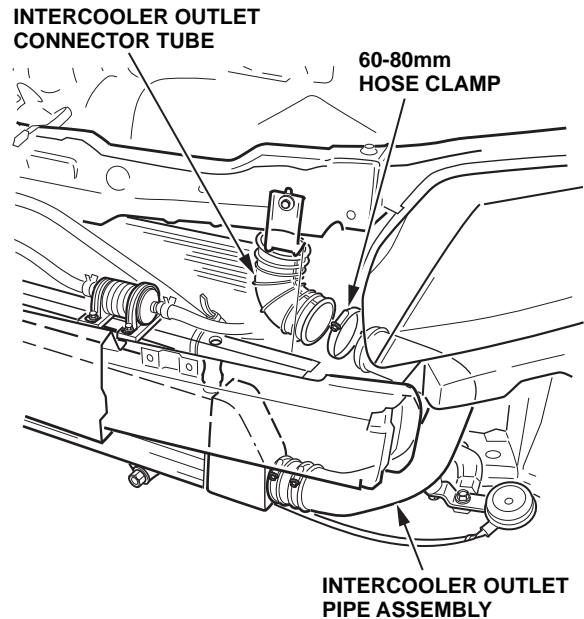
27.3 Secure the intercooler outlet pipe assembly to the vehicle in the original horn location.



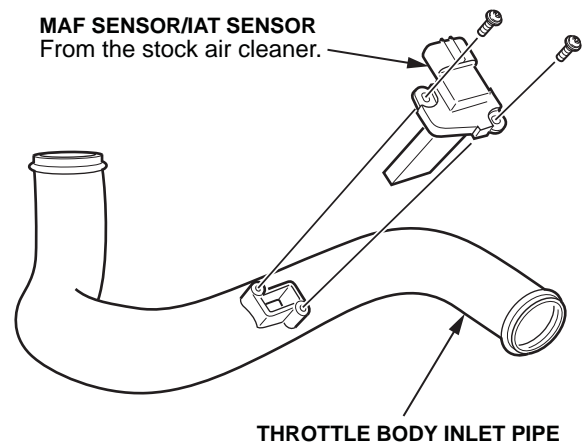
27.4 Secure the horn to the intercooler outlet pipe bracket.



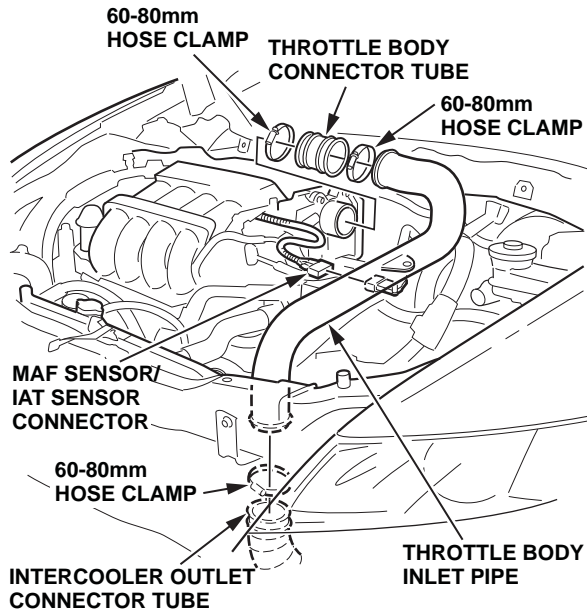
27.5 Connect the intercooler outlet pipe assembly to the intercooler outlet connector tube.



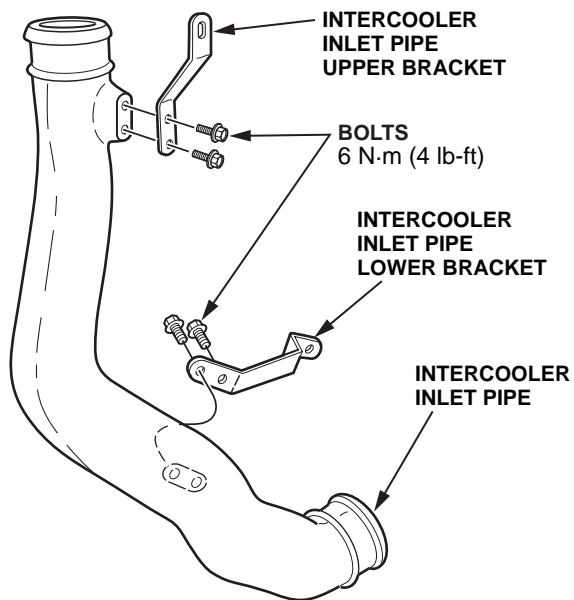
27.6 Remove the MAF sensor from the stock air cleaner, and attach the MAF sensor to the throttle body inlet pipe.



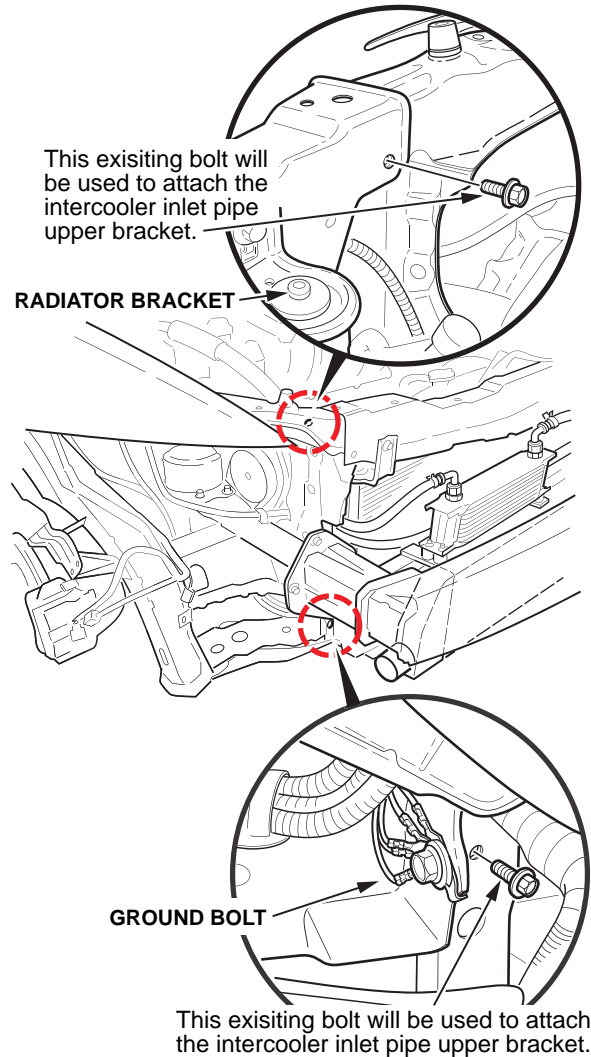
27.7 Connect the throttle body inlet pipe to the throttle body and the intercooler outlet connector tube. Then connect the MAF/IAT sensor connector.



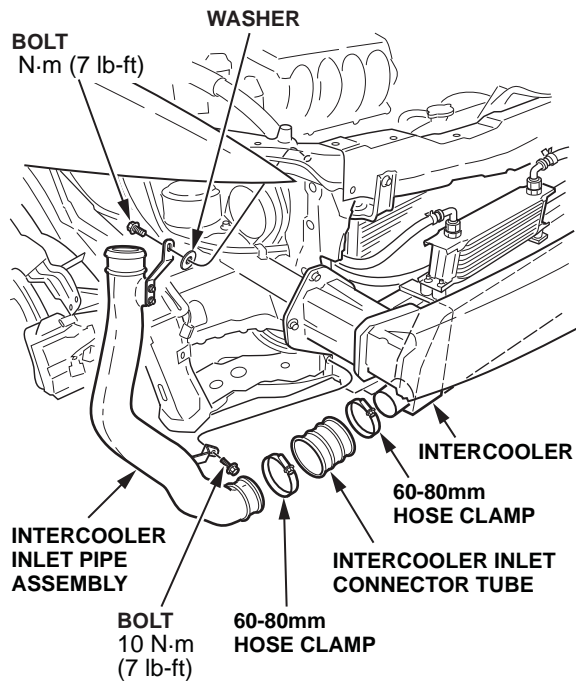
27.8 Attach the intercooler inlet pipe brackets to the intercooler inlet pipe.



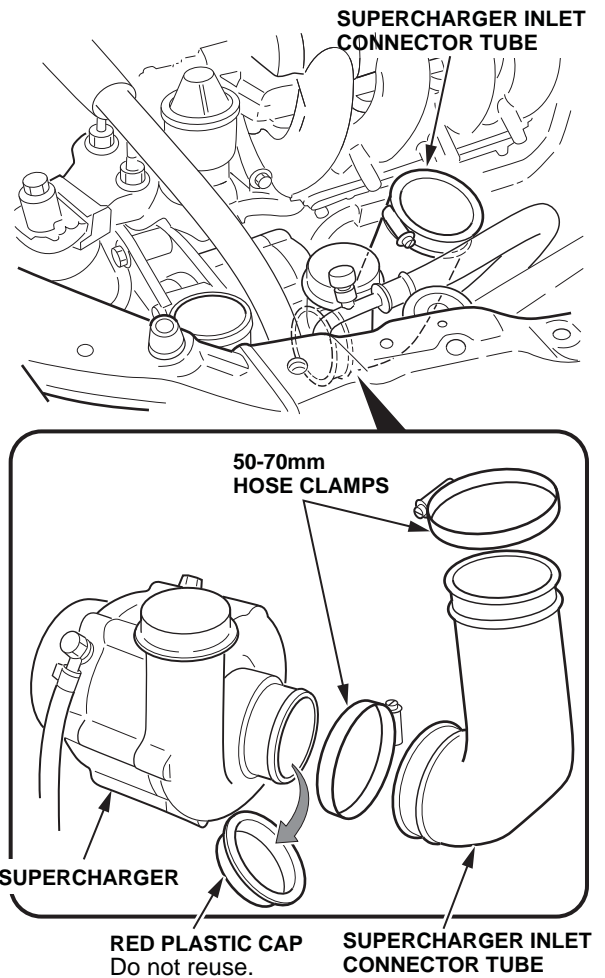
27.9 Remove the upper and lower core support bolts.



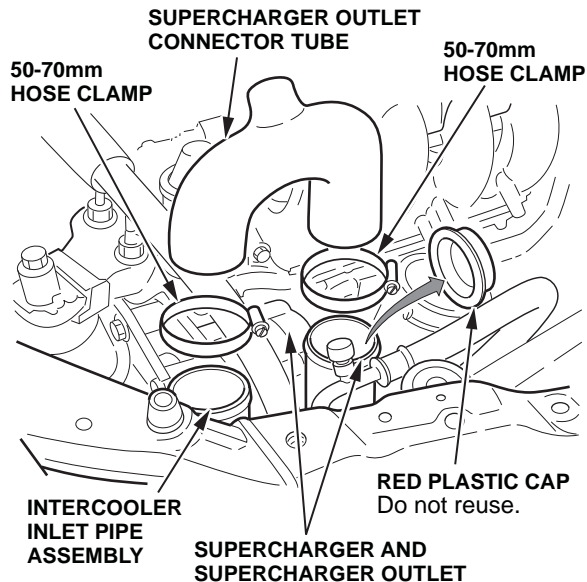
27.10 Connect the intercooler inlet pipe assembly to the intercooler. Secure the intercooler inlet pipe to the vehicle using the upper and lower core support bolts.



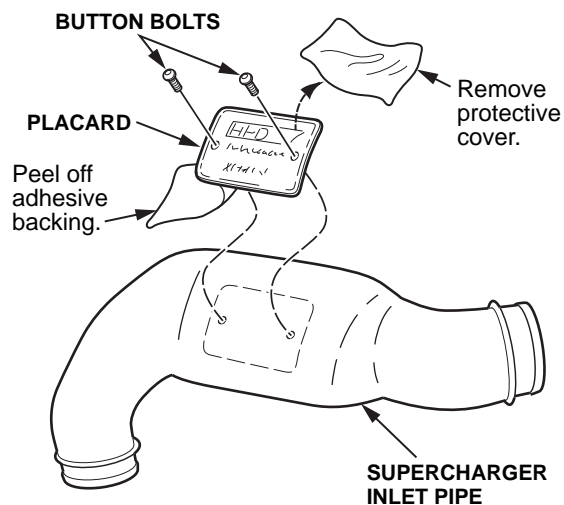
27.11 Connect the supercharger inlet connector tube to the back of the supercharger.



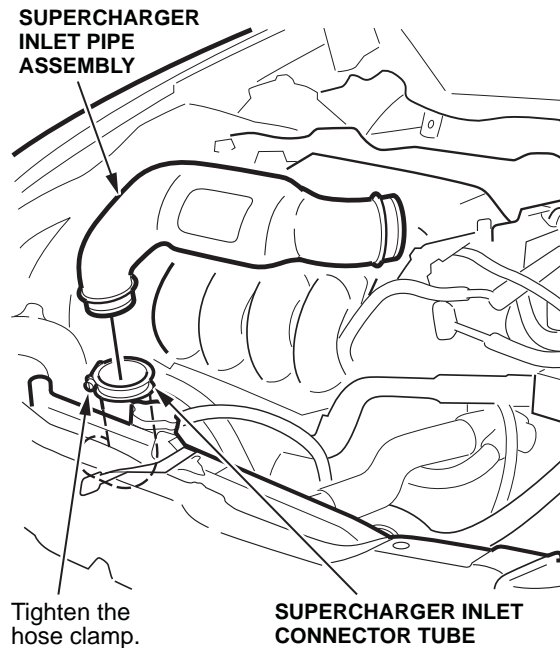
- 27.12 Connect the long side of the supercharger outlet connector tube to the supercharger, and the short side to the inlet pipe assembly.



- 27.13 Remove the adhesive backing from the HPD placard and attach the placard to the supercharger inlet pipe. Apply a small amount of thread lock to the bolts and install the bolts. Then remove the protective cover.

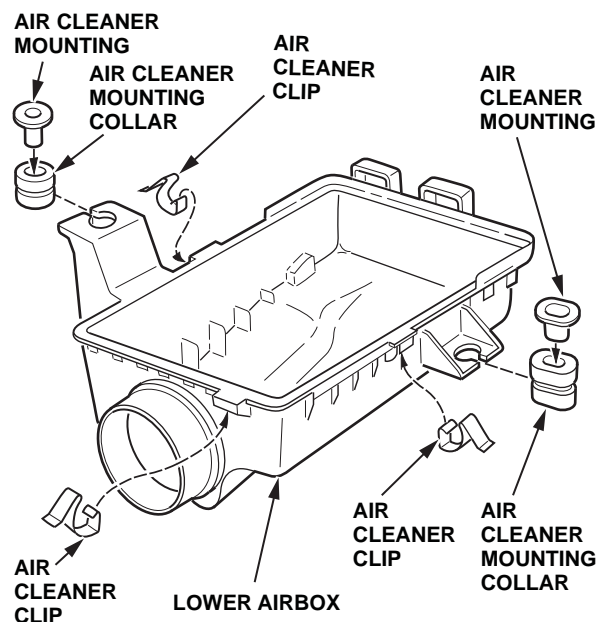


- 27.14 Connect the supercharger inlet pipe assembly to the supercharger inlet connector tube.

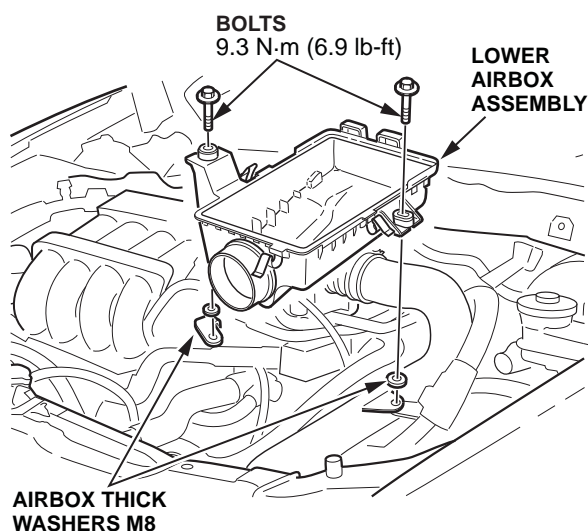


28. HPD airbox installation:

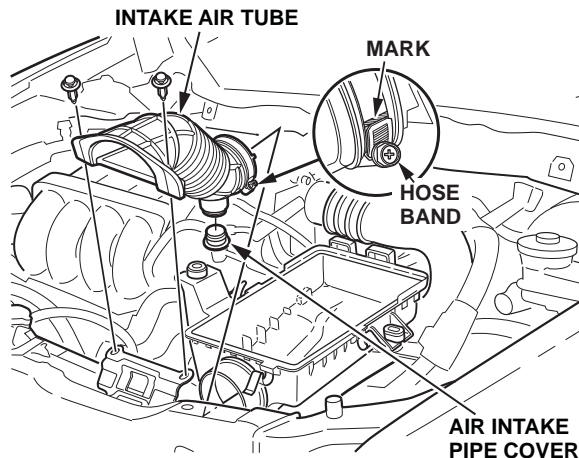
28.1 Assemble the lower airbox using the original air cleaner mounts, collars and HPD air cleaner clips.



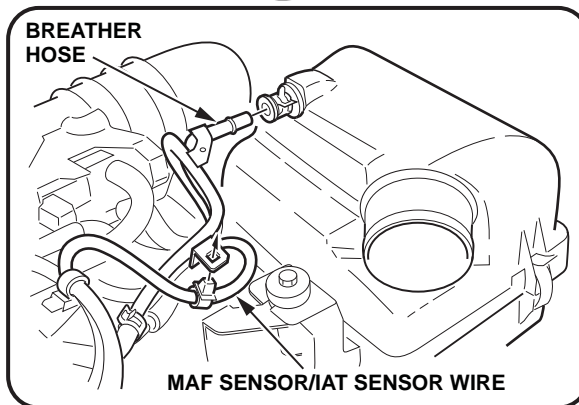
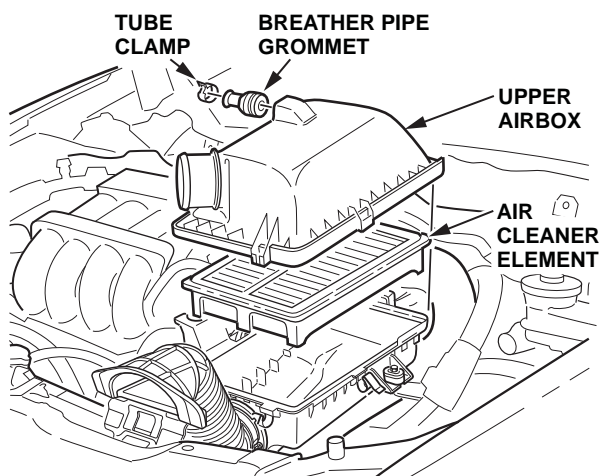
28.2 Secure the lower airbox to the vehicle using the two HPD bolts and spacers.



28.3 Install the HPD air intake pipe cover into the intake air tube. Secure the intake air tube to the vehicle using the original band clamp and clips.

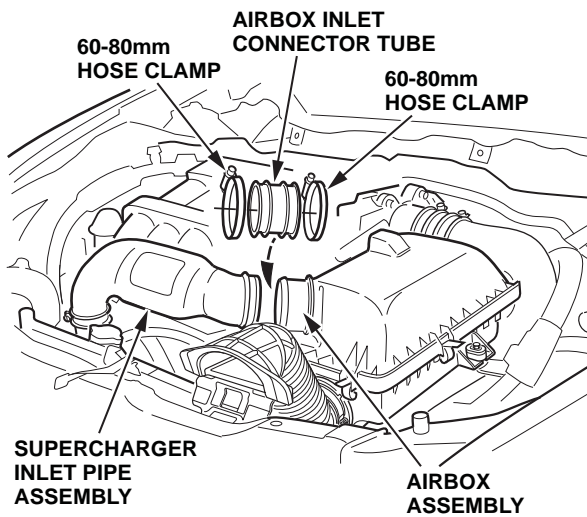


28.4 Install the HPD air cleaner element, then the upper airbox. Secure the upper airbox using the three air cleaner clips.



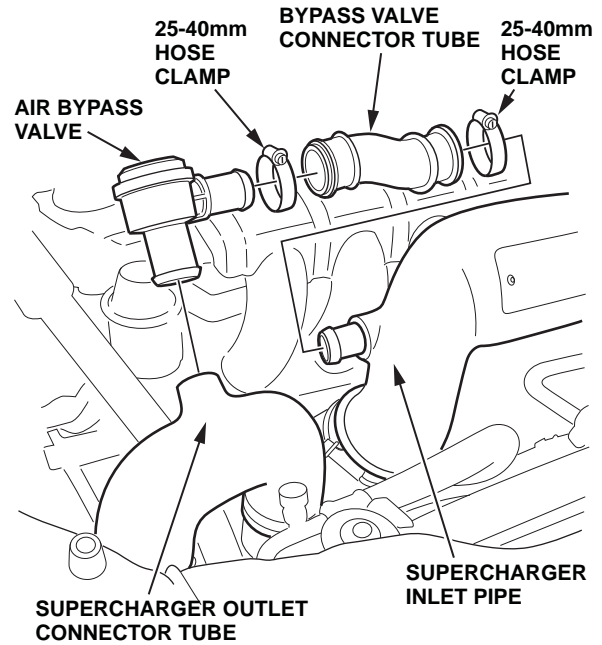
28.5 Insert the breather pipe grommet and tube clamp into the upper airbox. Insert the breather hose into the breather pipe grommet. Secure the MAF sensor wire to the breather hose.

- 28.6 Connect the supercharger inlet pipe assembly to the upper airbox assembly.

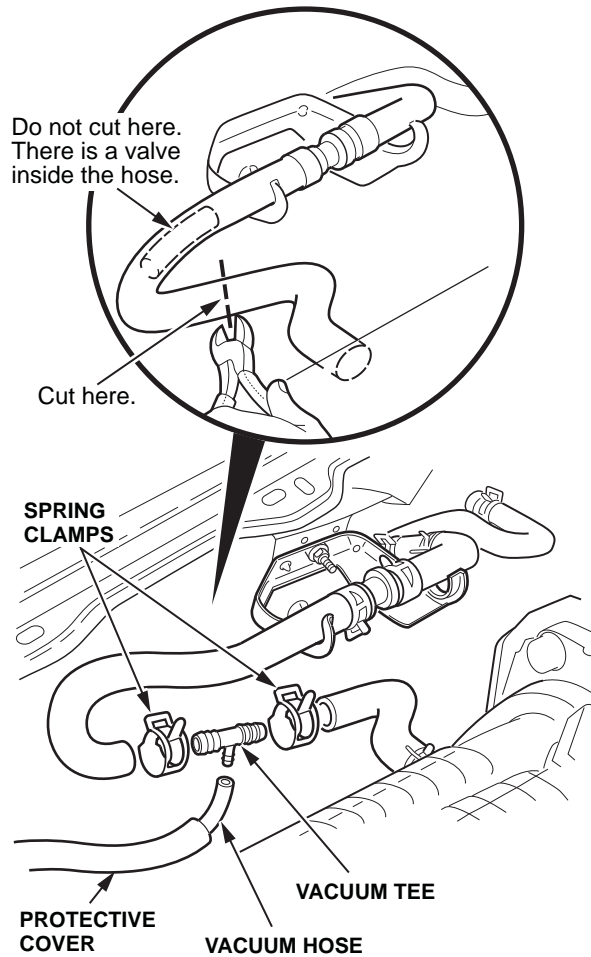


29. **HPD bypass valve installation:**

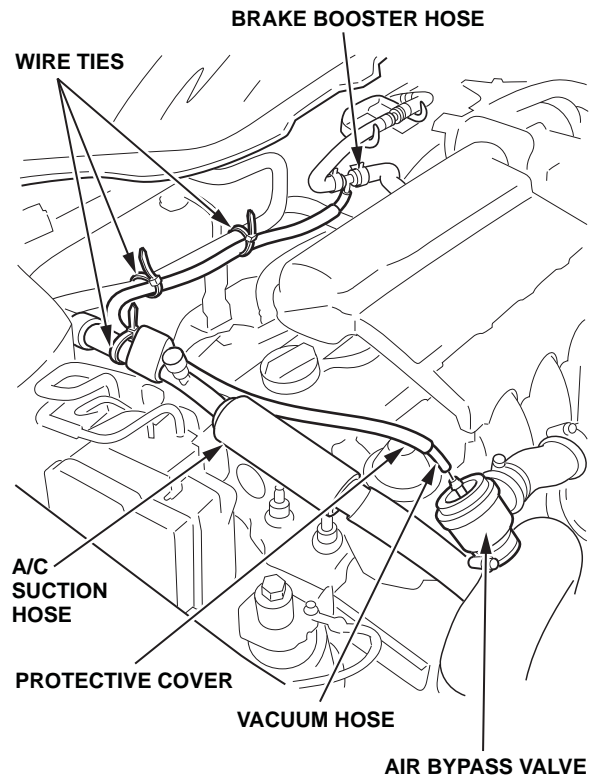
- 29.1 Insert the air bypass valve into the supercharger outlet connector tube, and connect the air pass valve with the supercharger inlet pipe using the bypass valve connector tube.



29.2 Locate the brake booster vacuum hose. Cut the brake booster hose in the area shown, and insert the vacuum tee.

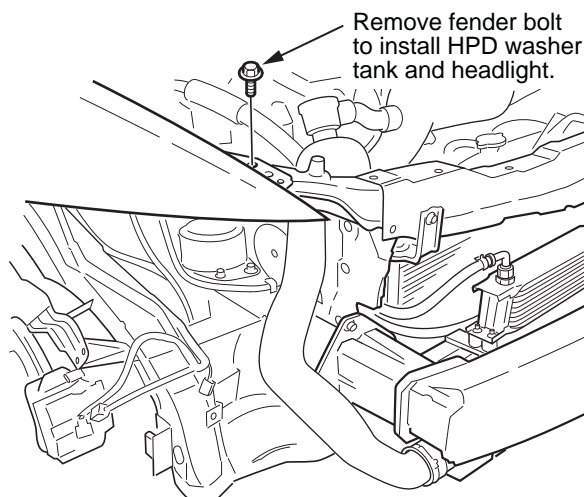


29.3 Install the protective sleeve over the vacuum hose. Connect one end of the vacuum hose to the air bypass valve, and the other end to the brake booster hose vacuum tee. Secure the hose to the vehicle using three wire ties.

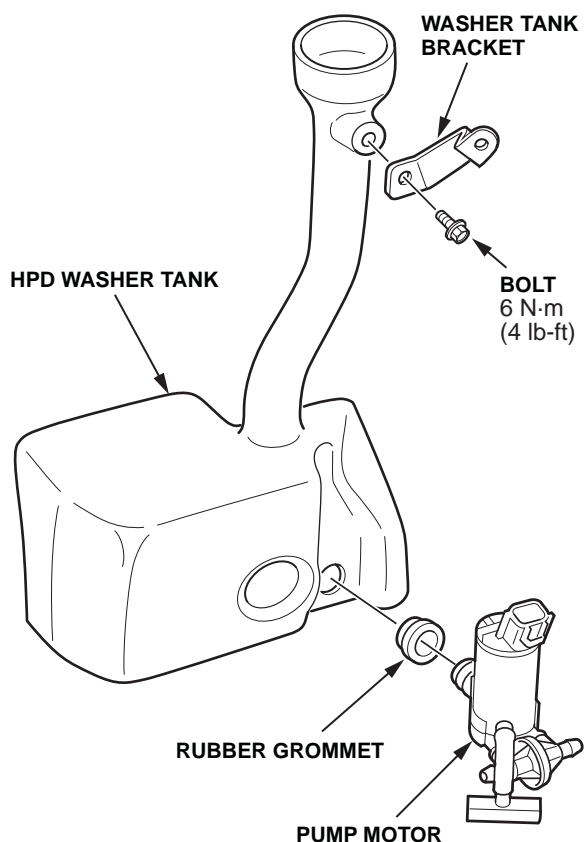


30. **HPD washer tank installation:**

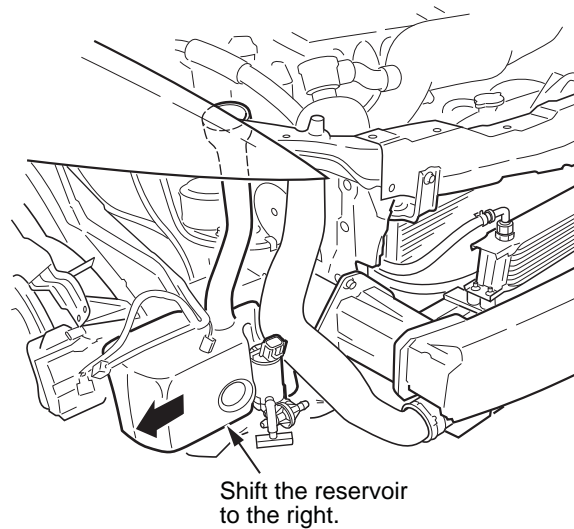
30.1 Remove the fender bolt.



30.2 Secure the washer tank bracket to the HPD washer tank. Insert the rubber grommet and pump motor.



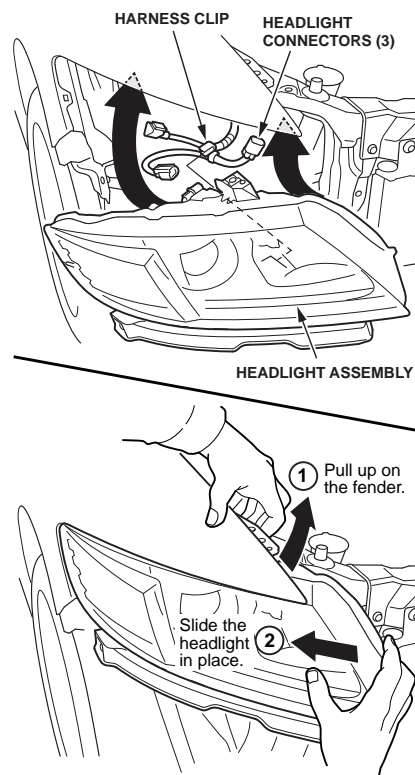
30.3 Route the top of the washer tank through the headlight opening, and position the washer tank to the left of the opening.



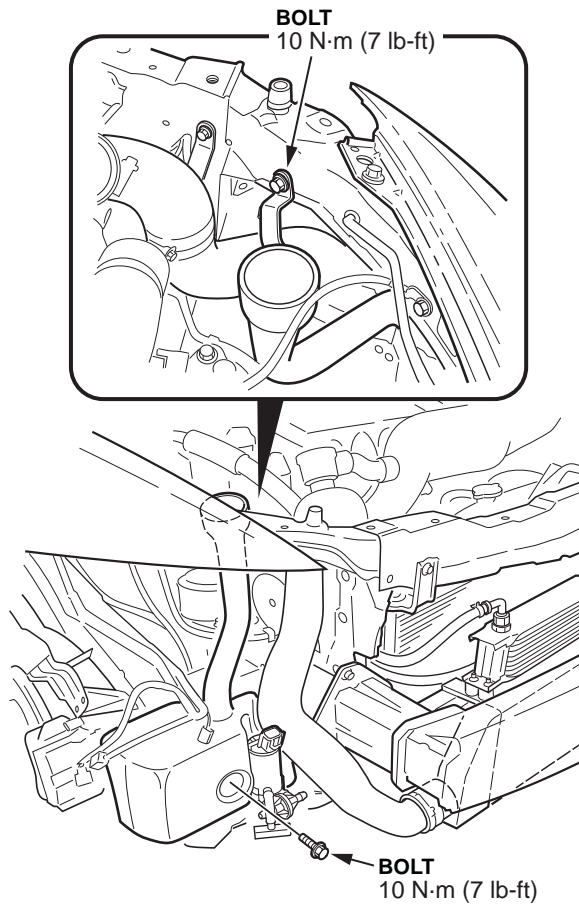
30.4 Connect the headlight connectors to the headlight and attach the harness clip.

30.5 With the lens facing upward and positioned to the right of the opening, place the headlight assembly bottom-first into the opening. Then pull up on the fender, tilt the headlight lens down and slide it to the left.

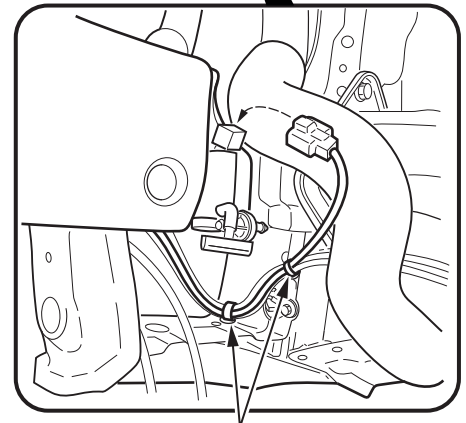
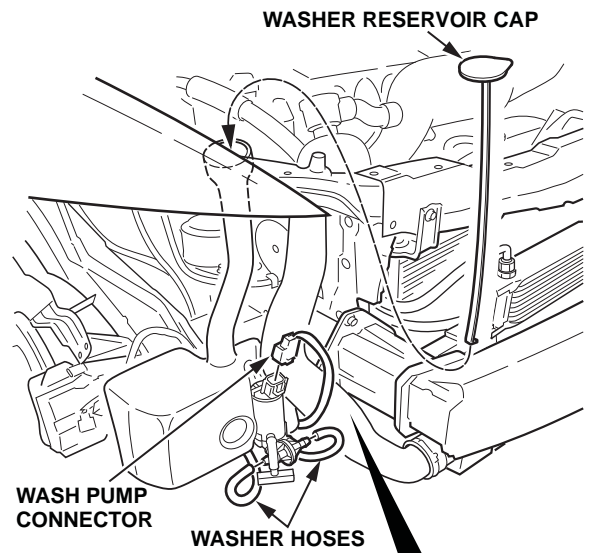
Note: Pull up on the fender slightly to clear the headlight.



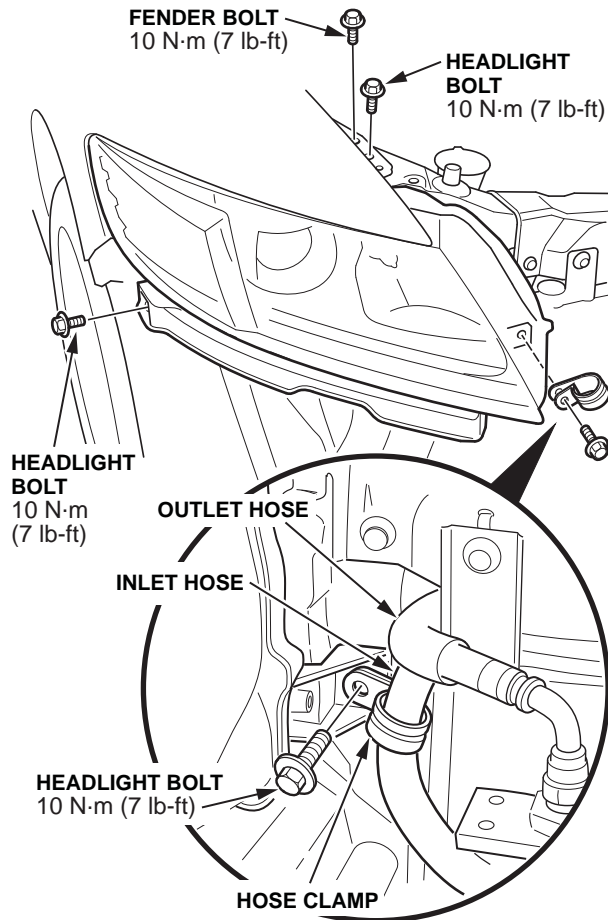
- 30.6 Secure the washer tank to the vehicle using the original bolt. Then torque the upper and lower washer tank bolts.



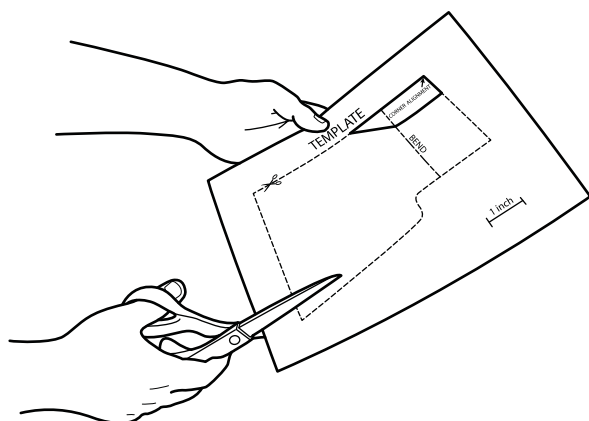
- 30.7 Connect the wash pump connector and the left and right washer hoses.



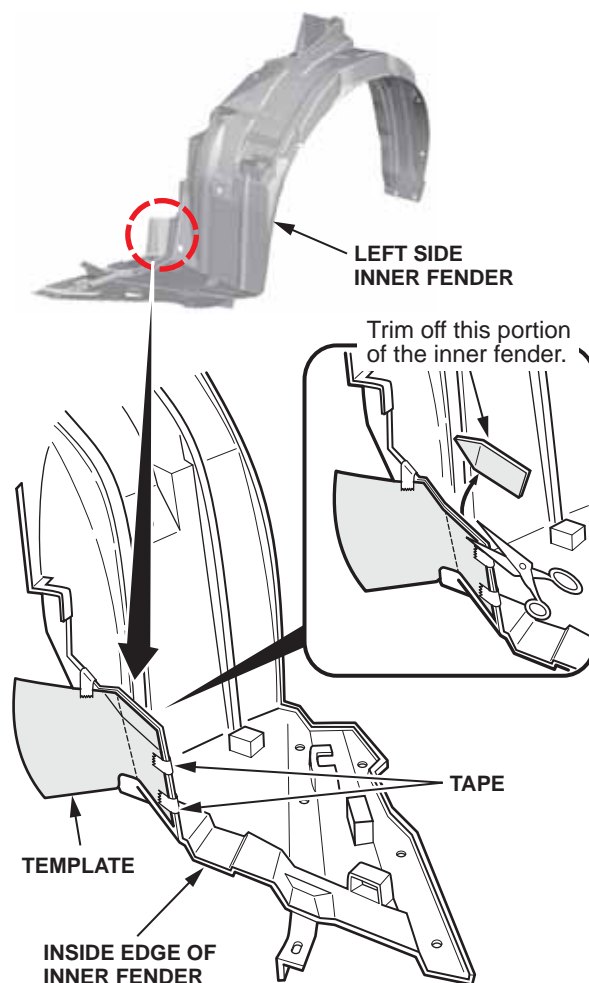
31. Secure the traction hose using the headlight bolt and hose clamp. Install the remaining headlight bolts and the fender bolt.



32. Trim the template along the dotted line. (see page 42).



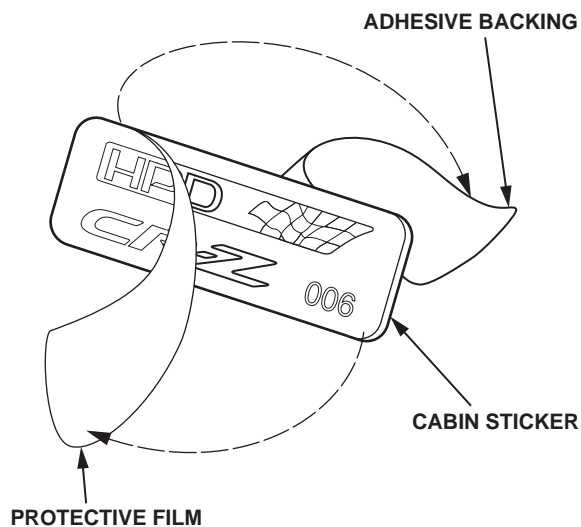
33. Tape the template to the inner fender. Trim the inner fender with scissors.



34. HPD dash placard installation:

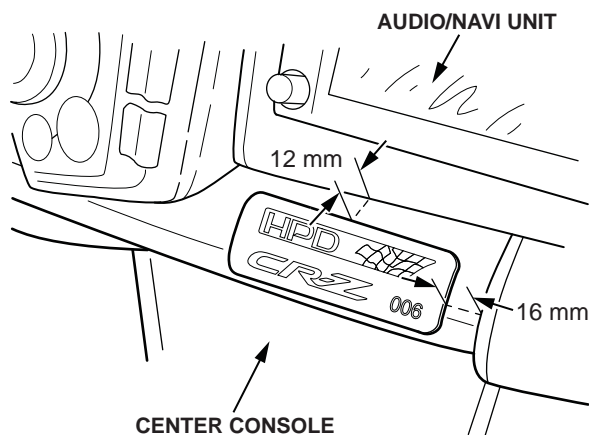
NOTE: the placard will be sent with the ECM/PCM from HPD after reprogramming.

- 34.1 Using isopropyl alcohol on a shop towel, thoroughly clean the area where the HPD placard will attach.



- 34.2 Remove the protective film and the adhesive backing.

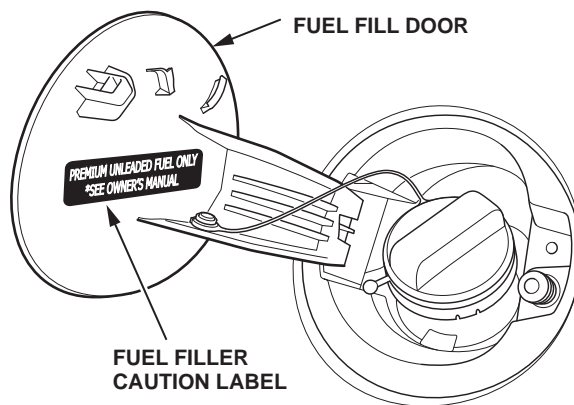
- 34.3 Align the top edge 12 mm from the center dash trim, and the right edge 16 mm from the passenger's middle panel. Then firmly press the placard in place.



35. HPD fuel filler label installation:

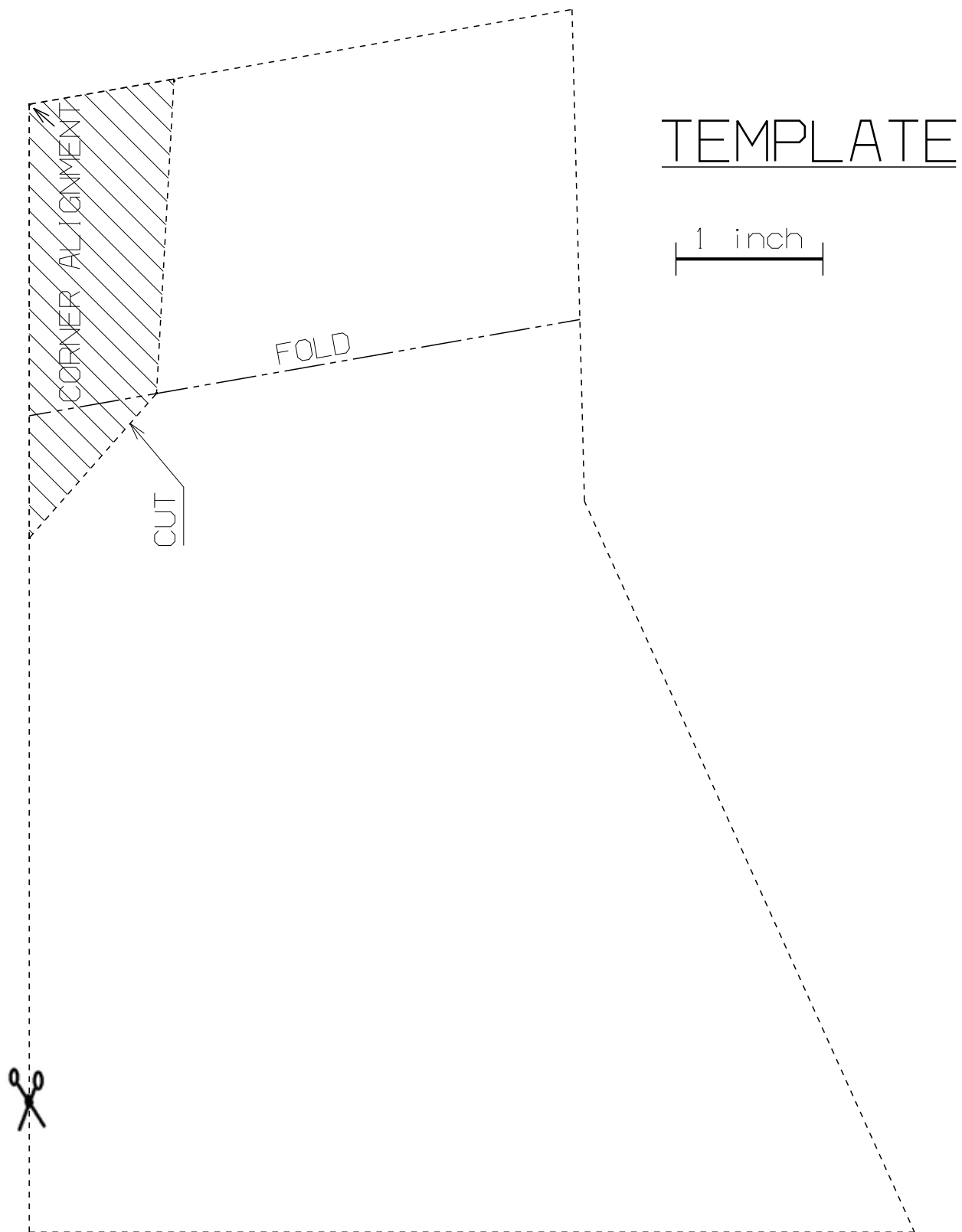
- 35.1 Install the HPD fuel filler caution label.

NOTE: Prior to starting the engine make sure the vehicle has premium gasoline (91 Octane) only.

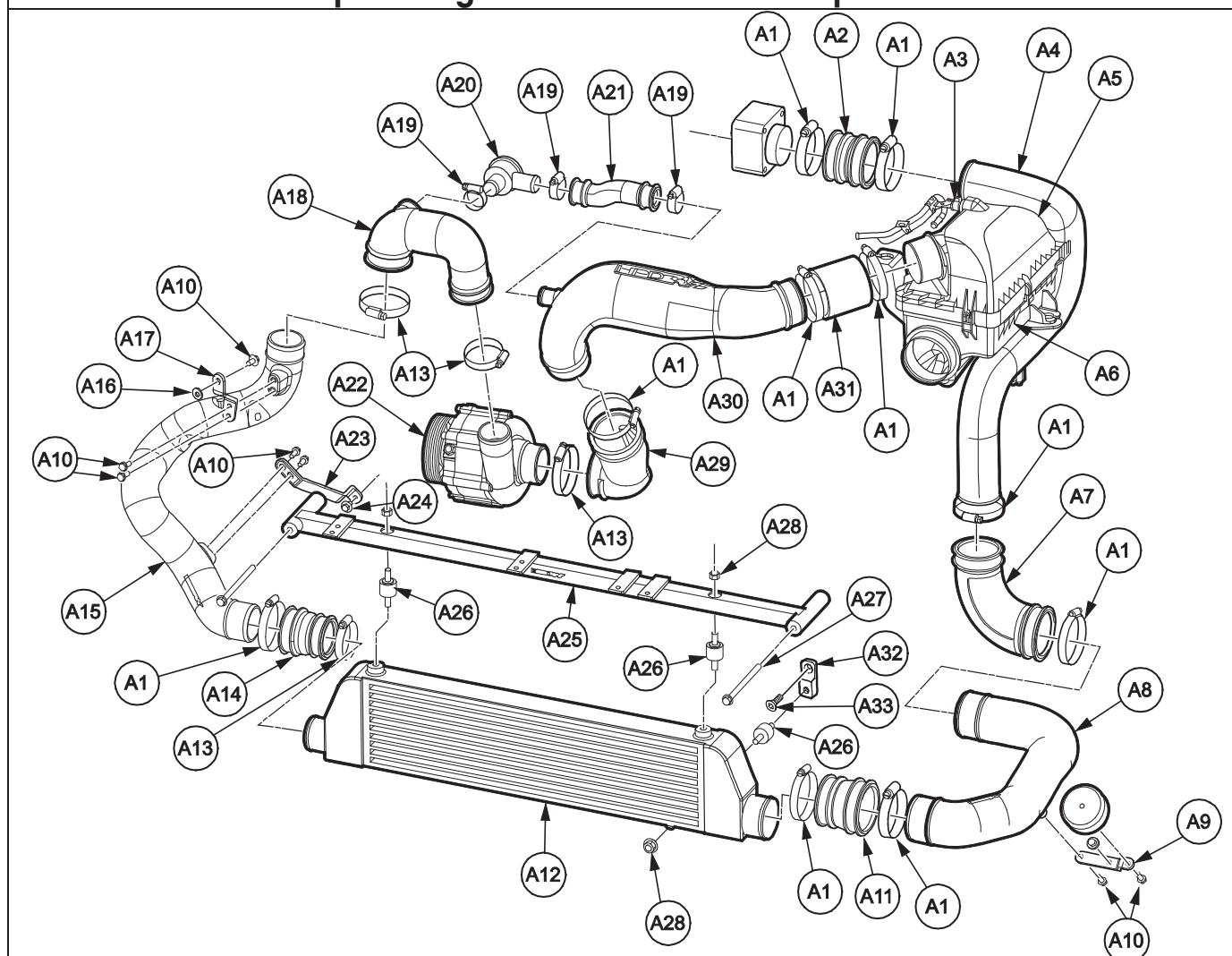


36. Make sure that all wire harnesses are routed properly and all connectors are plugged in.
37. Reconnect the negative cable to the battery.
38. Reinstall all removed parts.
39. Enter the customer's anti-theft code for the audio unit and navigation system (if equipped), and reset the radio station presets.
40. Reset the clock.
41. **Place pages 43-52 in the glove box after installation.**

WARNING: Prime the traction fluid system before starting the engine see page 45.



Supercharger and intercooler components



Callout	Description	Part Number	#	Callout	Description	Part Number	#
A1	Hose Clamp 60-80	91953-FC4Y-A00	10	A19	Hose Clamp 25-40	91950-FC4Y-A00	3
A2	Throttle Body Conn Tube	17281-F27S-A11	1	A20	Bypass Valve	17846-FC4Y-A01	1
A3	Breather Pipe Grommet	17136-REJ-W00	1	A21	Bypass Outlet tube	17288-F27S-A21	1
A4	IC Throttle body pipe	17491-F27S-A05	1	A22	Supercharger w/105mm	17800-F27S-A00	1
A5	Upper Airbox	17210-F27S-A20	1	A23	IC Inlet Pipe bracket Lower	17272-F27S-A01	1
A6	Lower Airbox	17240-F27S-A21	1	A24	Flange bolt 6x12 mm	95701-06012-08	1
A7	IC outlet pipe	17282-F27S-A11	1	A25	IC mounting bar	17262-F27S-A02	1
A8	IC outlet pipe	17489-F27S-A02	1	A26	IC AV Mount M8	19701-F27S-A00	3
A9	IC Outlet Pipe bracket & Horn	17273-F27S-A01	1	A27	Flange bolt 8x125 mm	96300-08125-09	2
A10	Flange bolt 6X16mm	95701-06016-08	7	A28	Flange nut 8 mm	94050-08080	2
A11	IC outlet tube	17283-F27S-A11	1	A29	SC inlet tube	17226-F27S-A11	1
A12	Intercooler	19700-F27S-A02	1	A30	SC Inlet pipe	17488-F27S-A11	1
A13	Hose Clamp 50-70	91952-FC4Y-A00	4	A31	Airbox inlet tube	17286-F27S-A11	1
A14	IC Inlet tube	17284-F27S-A11	1	A32	IC bracket 2013 models only	19702-F27S-A00	1
A15	IC Inlet pipe	17490-F27S-A03	1	A33	Socket head screw 8X25 mm	90123-FC4Y-A00	1
A16	Washer	91911-FC4Y-A00	1	A34	Drive belt	17845-FC4Y-000	1
A17	IC Inlet Pipe bracket Upper	17271-F27S-A01	1				
A18	SC outlet tube	17285-F27S-A20	1				



HPD ECM/PCM Recalibration Form

Owner's name: _____

Owner's address: _____

Address to return ECU to: _____

Owner's email address: _____

CR-Z Model year: _____ Trim level: _____

CR-Z is a 6 speed manual transmission: Yes _____ No _____

(Only 6 Spd. manual transmissions are eligible)

CR-Z VIN: _____

CR-Z Mileage: _____

CR-Z Purchase date: _____

CR-Z ECU Part number: 37820-RTW-____

CR-Z ECU Serial number: _____ - _____

NOTICE: THIS CERTIFICATION MUST BE COMPLETED BEFORE YOUR ENGINE ELECTRONIC CONTROL UNIT (ECU) WILL BE REFLASHED AND RETURNED.

Pursuant to Executive Order of the Air Resources Board, this HPD CR-Z Supercharger System may not be installed on a new motor vehicle before the vehicle has been sold to a consumer, or concurrent with the sale of a new vehicle to a consumer. This system may be installed (1) on a pre-owned vehicle at any time, or (2) on a new vehicle only after the vehicle has been sold to a consumer and as part of a separate transaction.

By signing and returning this form and the enclosed engine ECU, I hereby acknowledge and agree that I have read this certification and understand its terms, and certify that this HPD CR-Z Supercharger System will be installed on a motor vehicle in compliance with these terms.

Authorized Dealer Representative or Independent Installer (signed name)

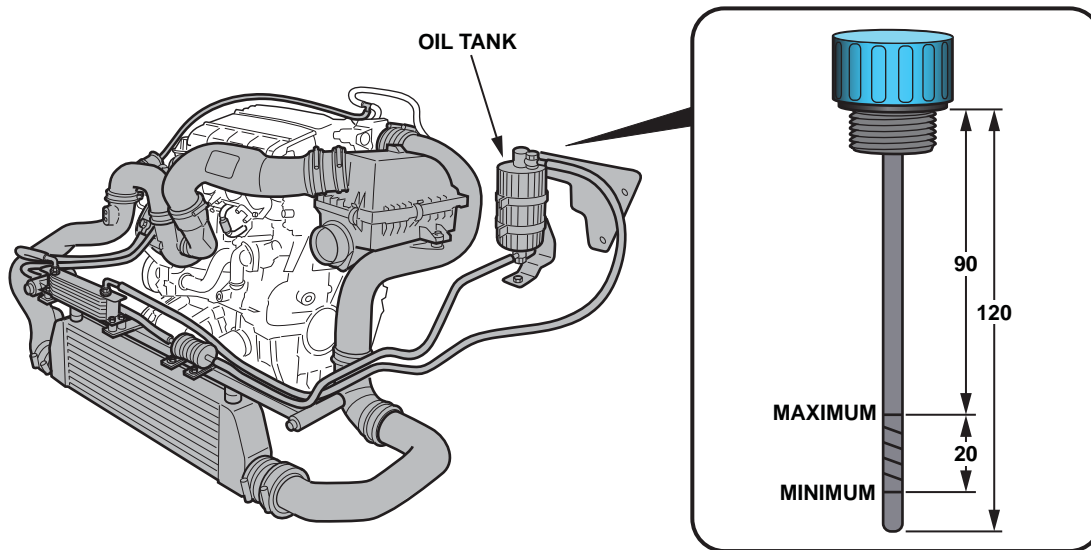
Authorized Dealer Representative or Independent Installer (printed name)

Send form to:

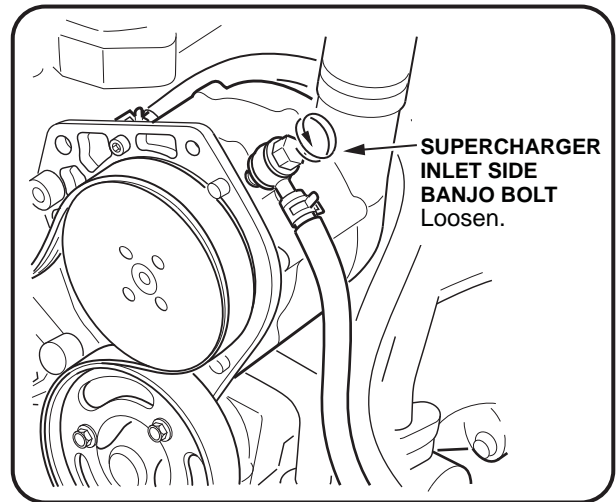
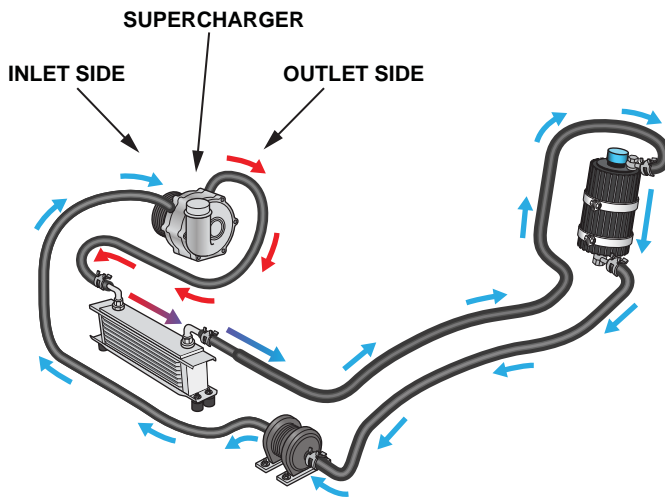
Honda Performance Development, Inc
Attn: HPD CR-Z ECU Reflash Program
25145 Anza Drive Santa Clarita, CA 91355

To ensure proper oil circulation and adequate lubrication, it is important to prime the oil system before starting the engine for the first time.

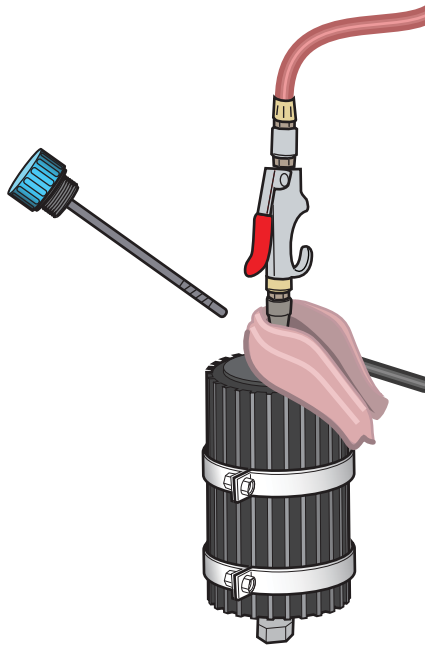
1. Carefully fill the oil tank with Rotrex traction fluid, do not exceed the maximum mark on the dipstick. Make sure the dipstick cap is fully installed when checking the oil level.



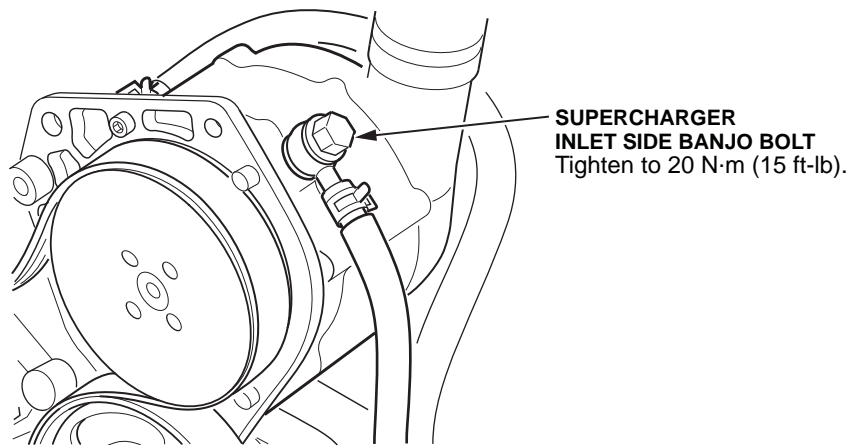
2. Loosen the banjo bolt on the supercharger inlet side a couple of turns to allow air to escape the system.



3. Using a clean shop rag and an air nozzle, apply air pressure inside the oil tank. Do not pressurize the system more than one bar or 15 psi.



4. When oil flows from the inlet side of the supercharger, tighten the banjo bolt.

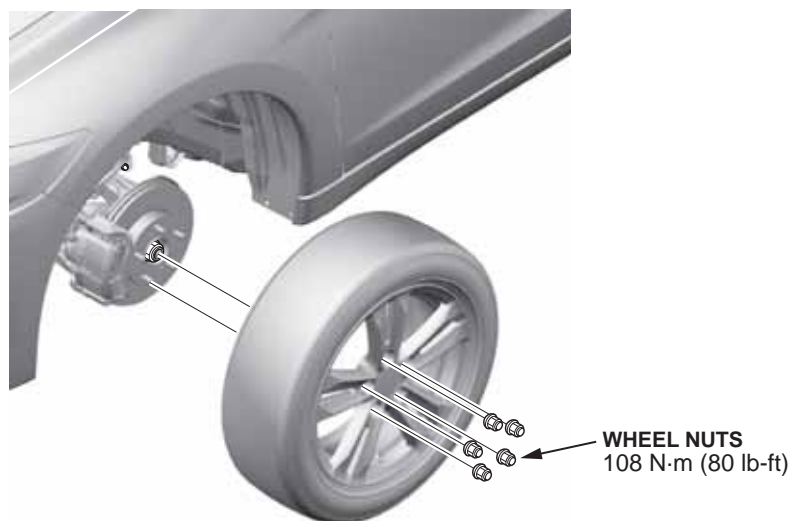


5. Fill the oil tank with more Rotrex traction fluid to the max mark on the dipstick.
6. Start the engine and increase the rpm to 2,000-3,000. Make sure the traction oil is flowing in the oil tank. **Do not exceed 3,000 rpm or you will damage the supercharger.** Proper oil flow is established when the oil level decreases. Do not allow the Rotrex traction fluid to reach the bottom of the canister. After a few minutes of running, and with the engine between 2,000-3,000 rpm adjust the oil level between the min and the max indicators on the dipstick.
Note: When checking the traction oil level, always follow this procedure.
7. Let the engine idle for 5 minutes while checking the vehicle for oil leaks.
8. Repeat step 6 to check the level one more time.
NOTE: A run-in period of 65 miles is required. During the run-in period, drive the vehicle moderately and avoid hard acceleration or high rpm.

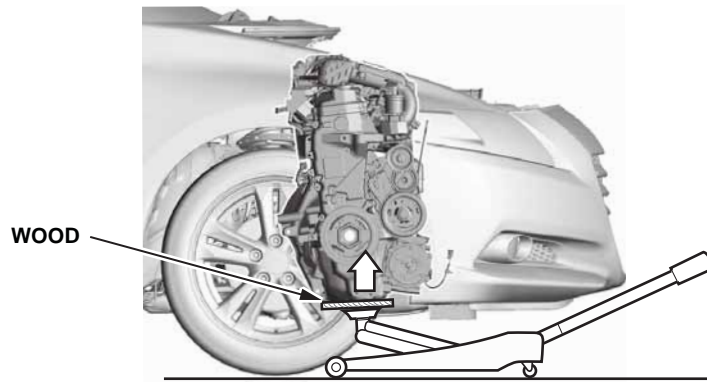
Maintenance

The recommended maintenance is to change the Rotrex traction fluid, filter and drive belt every 50,000 miles or two years whichever comes first. **NOTE:** when changing engine oil always use Honda Ultimate Synthetic 0w-20 engine oil.

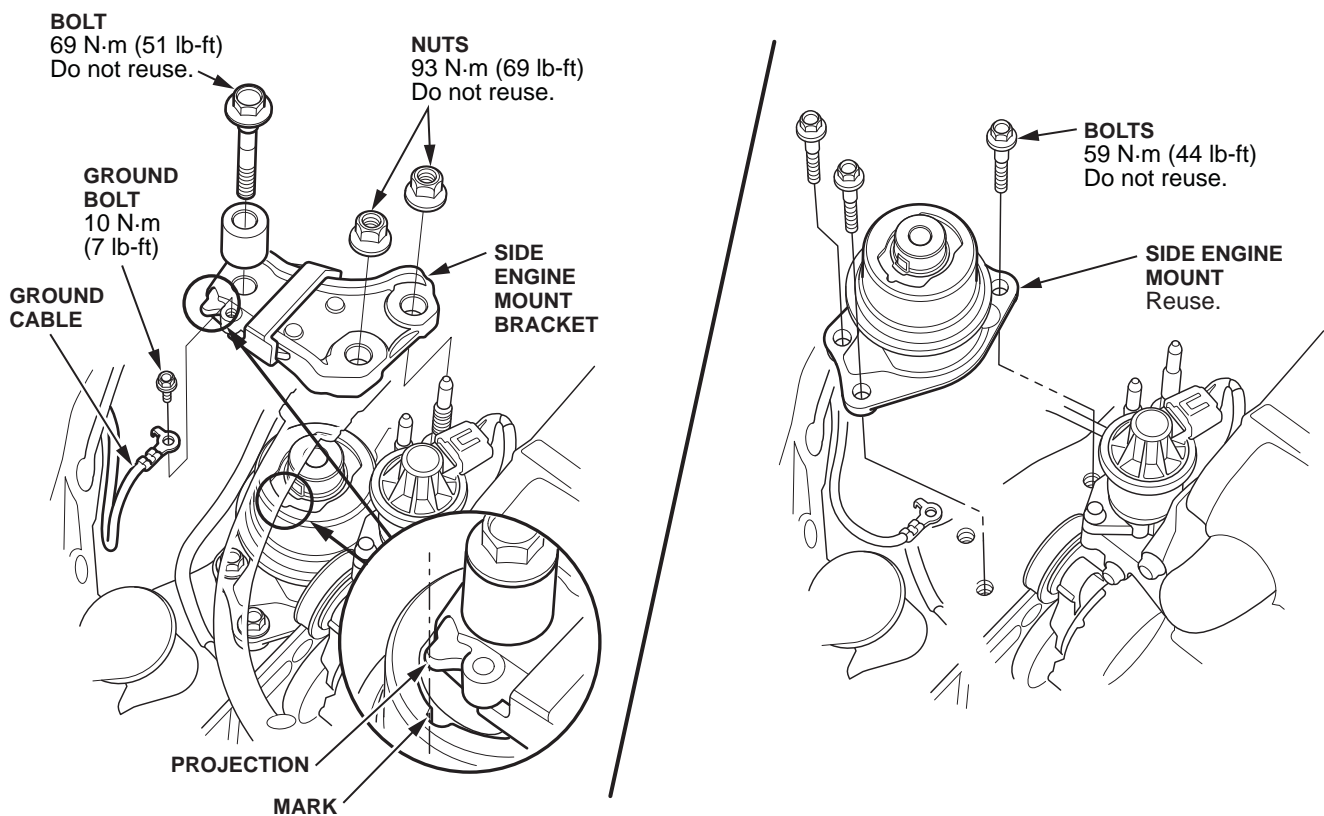
1. Allow the engine to cool down.
2. With the vehicle on Jack stands or a hoist, remove the passenger side wheel, splash guard, and the engine under cover.



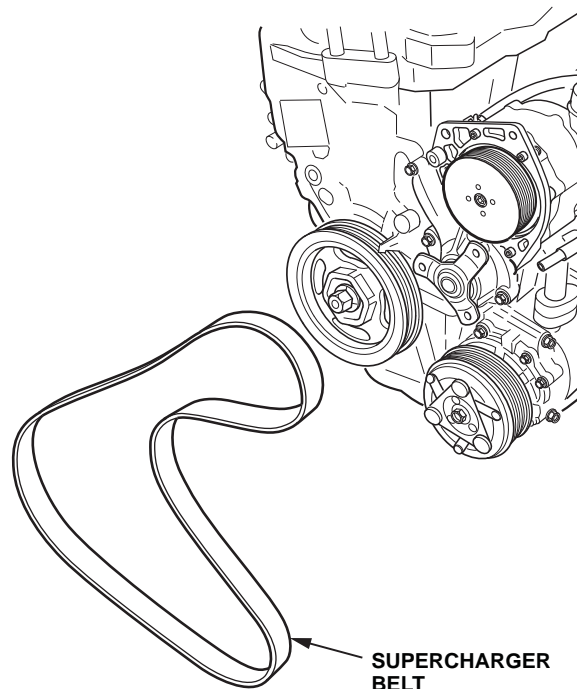
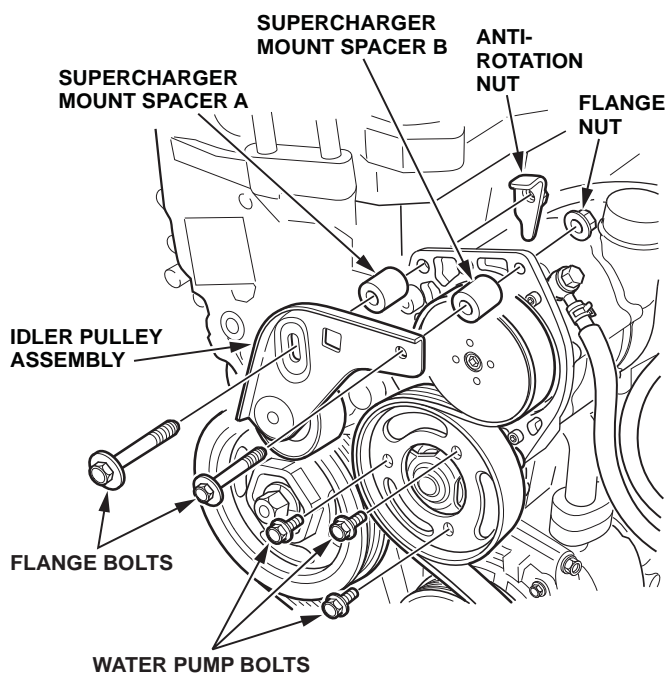
3. Support the engine with a floor jack and a wood block under the oil pan.



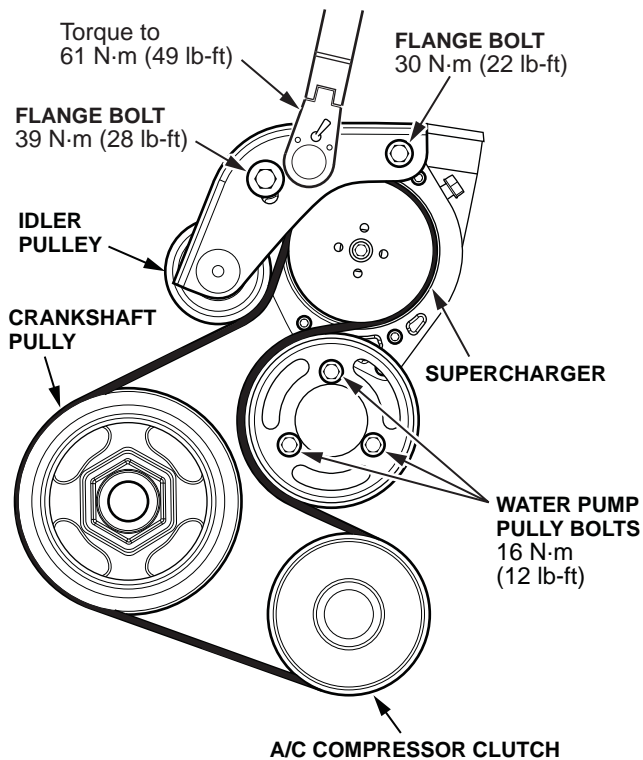
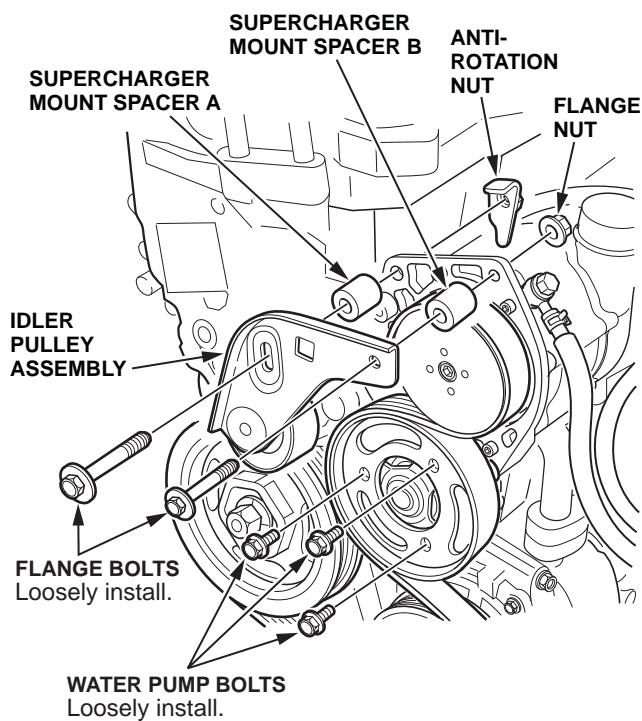
4. Remove the side engine mount ground cable and the side engine mount bracket assembly. Then remove the side engine mount.



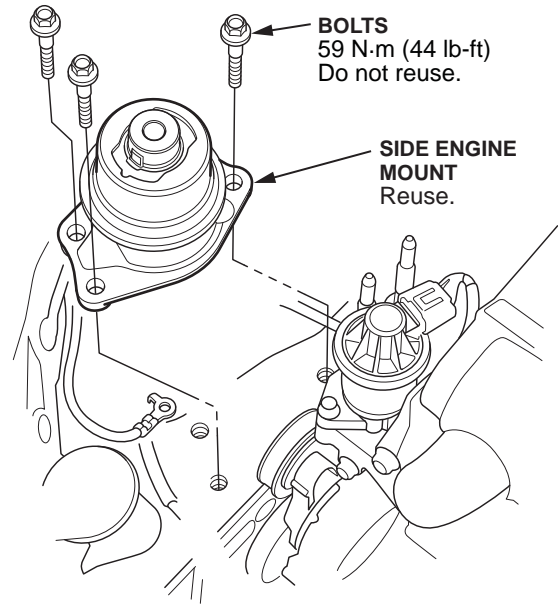
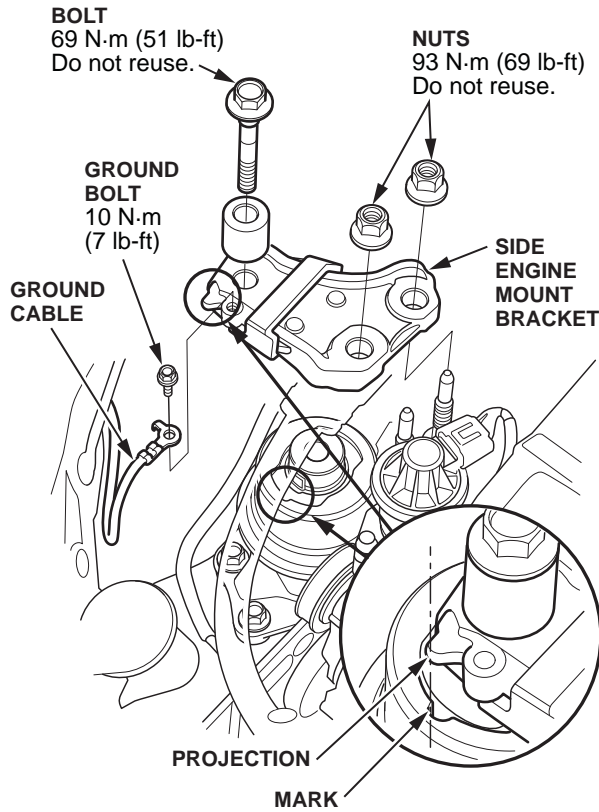
5. Remove the water pump pulley.



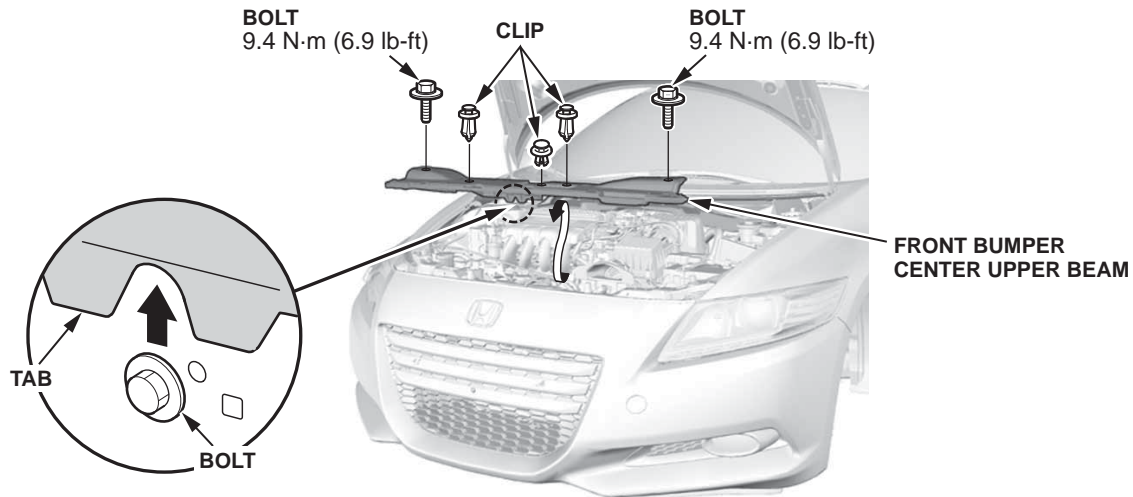
6. Remove the idler pulley assembly, and remove the old drive belt.
7. Align the new drive belt. Install the water pump pulley, idler pulley assembly and tighten the drive belt to 61 N.m (49 lb-ft), then torque the idler pulley assembly flange bolts and water pump pulley.



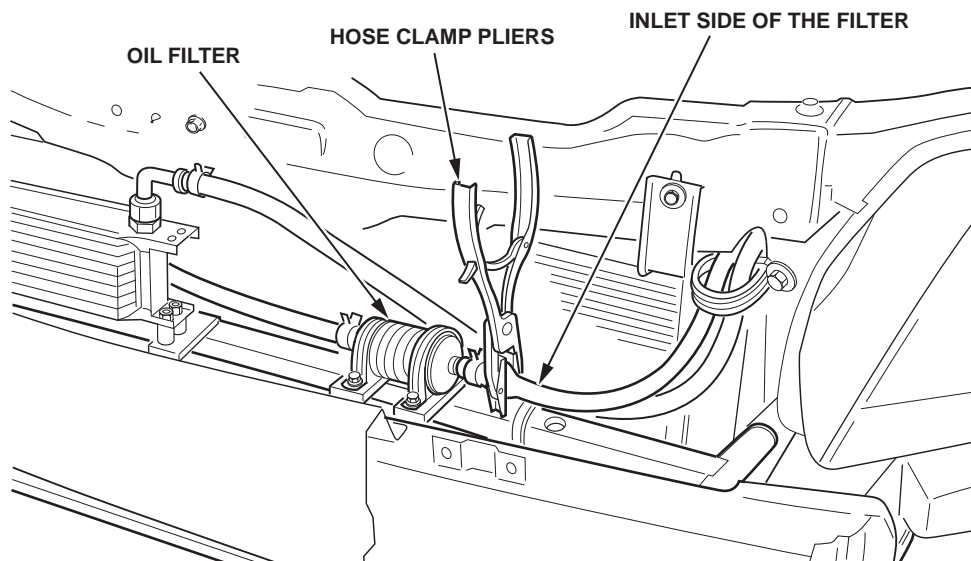
8. Install the side engine mount and the side engine mount bracket in the reverse order of removal. Then remove the floor jack.



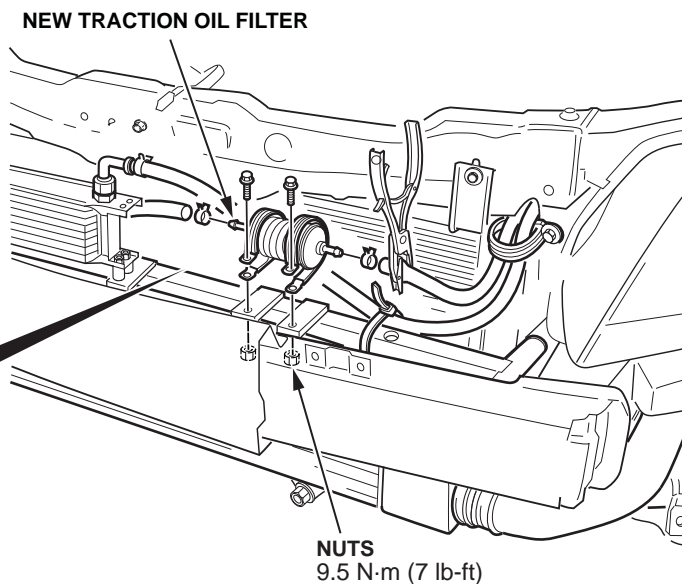
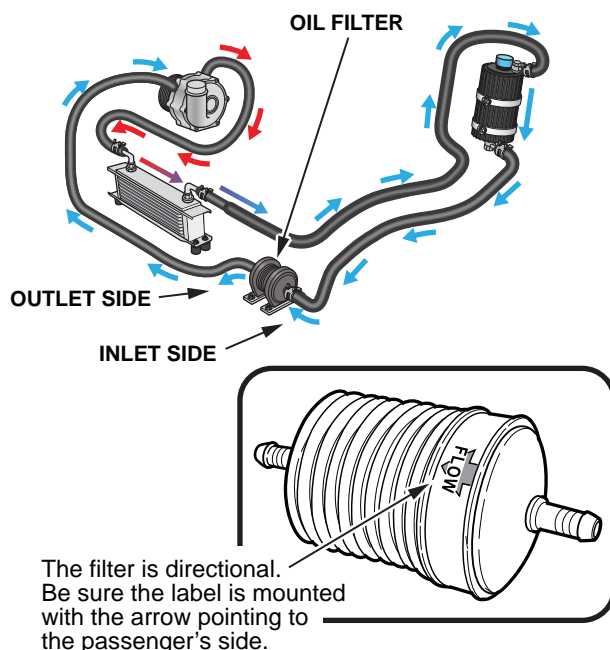
9. Remove the bolts and clips. Lift the front bumper center upper beam up to clear the front bolt, then remove the beam.



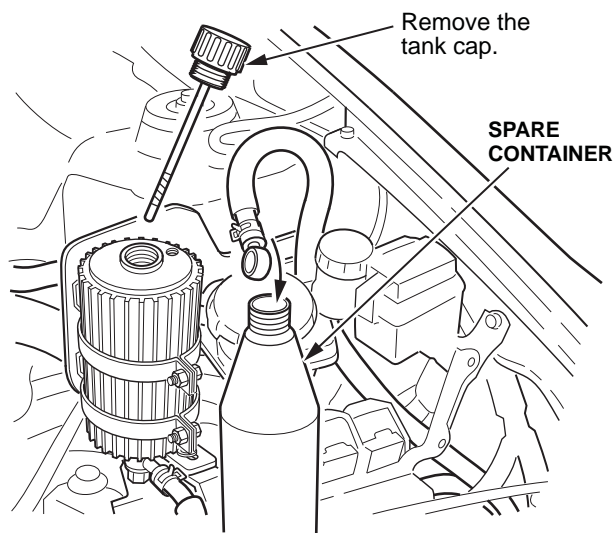
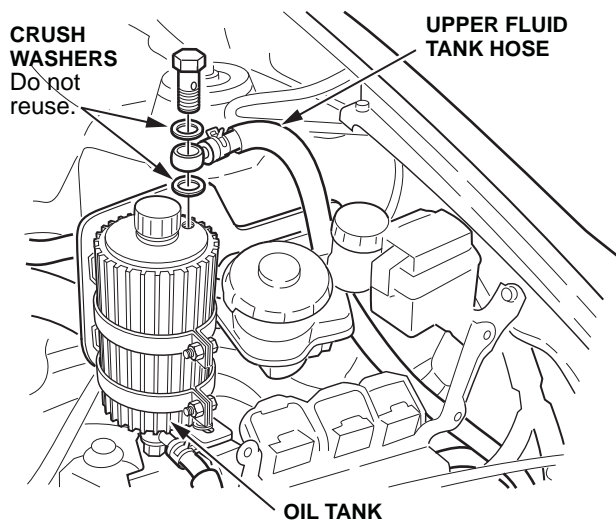
10. Using hose clamp pliers, clamp the oil hose as close to the oil filter as possible on the inlet side of the filter.



11. Slide the two hose clamps away from the oil filter and loosen the loop clamps, then remove the oil filter. Keep in mind that the oil filter still contains oil.

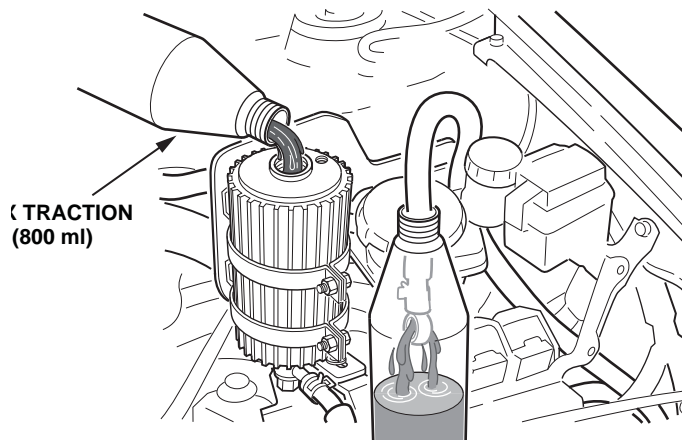


12. Mount the new oil filter with the arrow pointing towards the passenger side of the vehicle.
13. Slide the two hose clamps back to the correct position.
14. Remove the hose clamp pliers.
15. Clean all the upper oil hose connections on the oil tank to prevent any debris from entering the system. Then remove the upper oil tank banjo bolt and insert the hose into a temporary open oil reservoir with a minimum capacity of 1 liter.



16. Remove the tank cap.
17. Start up the engine and let it idle while adding Rotrex traction fluid continually to the oil tank. Continue to observe the oil level; do not allow the traction oil to reach the bottom of the canister. Continue to pour the oil into the oil tank until

800 ml has been added to the system, then turn the engine off.



18. Install the oil tank upper hose, using new copper washers.
19. Start the engine and increase the rpm to 2000-3000 and make sure the traction oil is flowing in the oil tank. Do not exceed 3000 rpm or you will damage the supercharger. Do not allow the traction oil to reach the bottom of the canister. After a few minutes of running, and with the engine between 2,000-3,000 rpm adjust the oil level between the min and the max indicators on the dipstick.
Note: When checking the traction oil level, always follow this procedure.
20. Let the engine idle for 5 minutes while checking the vehicle for oil leaks.