

If there are questions regarding the work procedure:

- U.S. dealers, contact Warranty
- Canadian dealers, open an VTA ticket using concern group “Compliance_Recall Assistance (C)”

Required Tools:



⇐ HOP82005 – Hopkins Vision 100
(or equivalent)



⇐ VAS 1978/1-2 – Crimping Pliers
(Base tool)



Tip: This tool is included in the –
VAS 1978B- Wiring Repair
Kit



⇐ VAS 1978/1-1 – Exchangeable
Head, 0.35-2.5mm



Tip: This tool is included in the –
VAS 1978B- Wiring Repair
Kit



⇐ UTI-100SI Ultratorch



Tip: This tool is included in the –
VAS 1978B- Wiring Repair
Kit



⇐ VAG1331 – Torque Wrench 1331 5-
50Nm (or equivalent)



⇐ VAG1783 – Torque Wrench 1783 2-
10Nm (or equivalent)

Required Parts:

<u>Quantity</u>	<u>Part Number</u>	<u>Part Description</u>
2	561998109	Headlight Socket Repair Kit*
4	000 979 941	Butt connectors* (2 per headlight)
2	8T0 827 249	Hood Bumpers
2	N 011 666 20	Washer
2	N 910 706 01	Plastic Cap



*part quantities are as required based on technician findings.

Work Procedure



Tip: If Campaign Completion label is present, no further work is required

Applicable Criteria ID (s)	Campaign/Action Status
01	Open

EXAMPLE

Section A – Check for Previous Repair

- Enter the VIN in Elsa and proceed to the “Campaign/Action” screen



Tip: On the date of repair, print this screen and keep a copy with the repair order

- ⇐ Ensure that the Status is “Open”
<arrow 2>
- ⇐ Note the Applicable Criteria ID
<arrow 1> for use in determining the correct work to be done and corresponding parts associated

- Proceed to Section B.**

Section B – Disconnect Battery



Tip: Record all radio pre-sets and Comfort settings

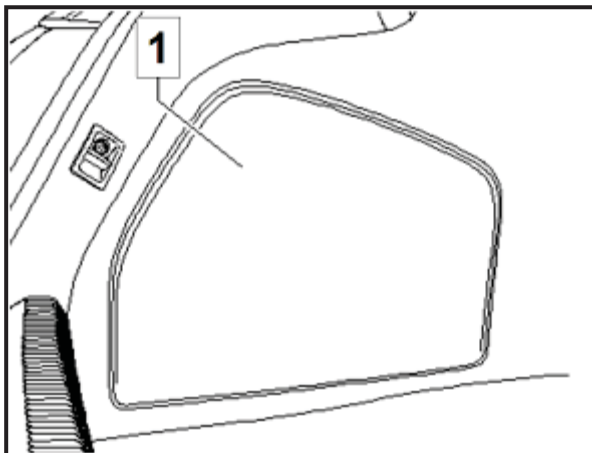
- Turn off all electrical consumers.
- Switch ignition off and remove key.

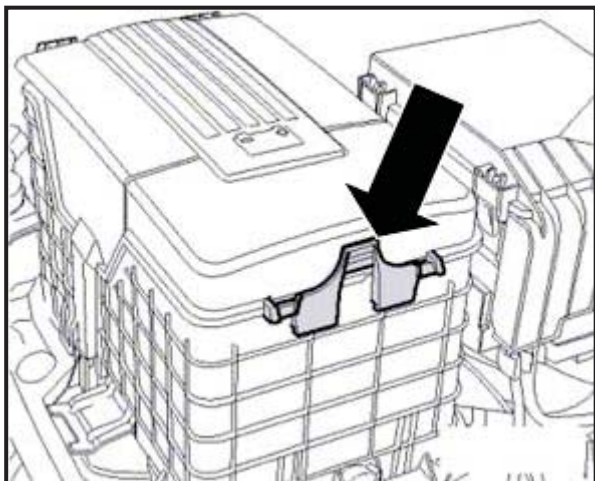


Tip: Before disconnecting battery, disable alarm.

For 3.6L Passat:

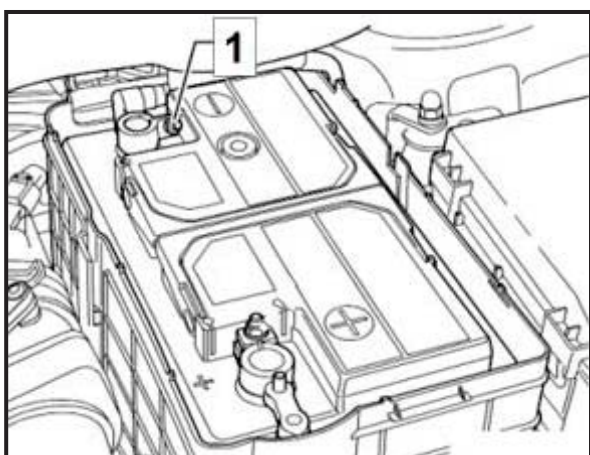
- Open trunk.
- ⇐ Unclip and remove battery service cover <1>.





For all other vehicles:

- Open hood.
- ⇐ If equipped, open locking mechanism <arrow> and remove battery box cover.



- ⇐ Disconnect battery terminal clamp of Ground (GND) wire <1> from battery Ground (GND) terminal.

Continue to Section C

Section C – Fuse Panel Washers

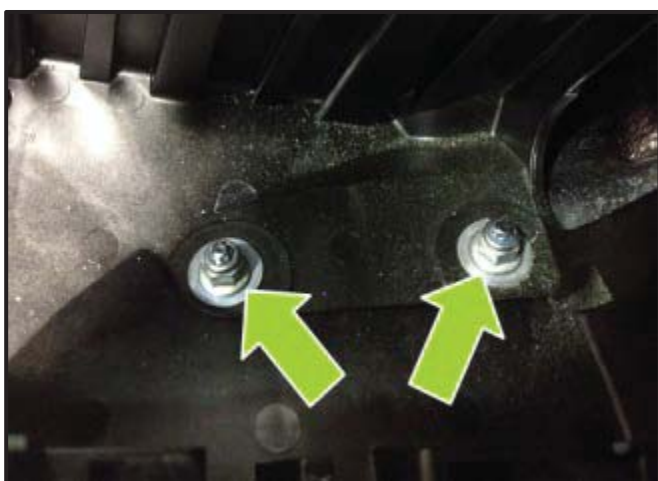


Tip: Using a permanent marker, label the position of the connections as shown <circle> so that they are installed correctly during reassembly.

- ⇐ Loosen and remove the threaded connections <circle> on the E-box.



⇐ Release the tabs <arrows> while gently lifting the e-box upward out of the housing.



⇐ Remove the two nuts <arrows>.

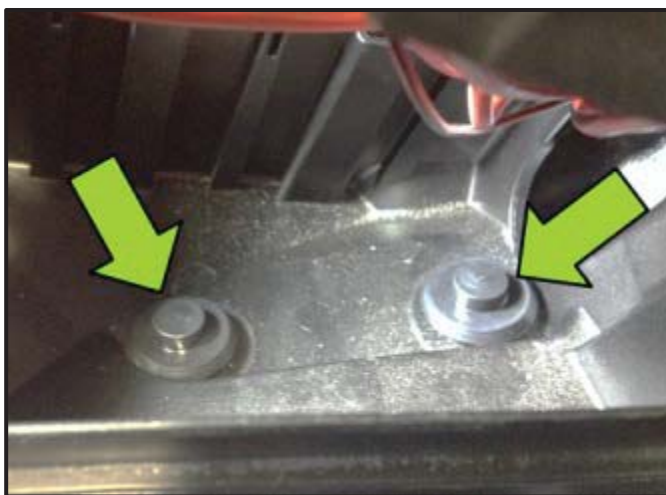


⇐ Place 1 washer part number (N 011 666 20) onto each mounting stud <arrows>, then reinstall the nut onto the mounting stud.

- Torque each nut to 6Nm.



Note: It is not necessary to remove the existing washers from the mounting studs. Simply install the replacement washers over top, then reinstall each nut.



⇐ Install 1 plastic cap (N 910 706 01) onto each mounting nut <arrows>.



⇐ Reinstall the e-box into the housing and press firmly into position to make sure each tab <arrows> is seated fully into place.



Note: To prevent wire harness damage, ensure that the rear portion of the E-box is correctly mounted to the housing.



⇐ Reinstall each threaded connection accordingly to the E-box <circle> then torque each nut to 9Nm.

Continue to Section D

Section D – Verify Headlight Generation Level



⇐ Inspect each Headlight Label <arrows> for the Generation Number.



⇐ If the Generation Number for either headlight is **below 24S** as shown <circle>, continue to Section E.



⇐ If the Generation Number for both headlights is **24S or higher** as shown <circle>, **Work Complete, Proceed to Section – Hood Bumper Replacement.**



⇐ If the label cannot be read as shown <left>, **Proceed to Section E – Headlight Assemblies Removed.**

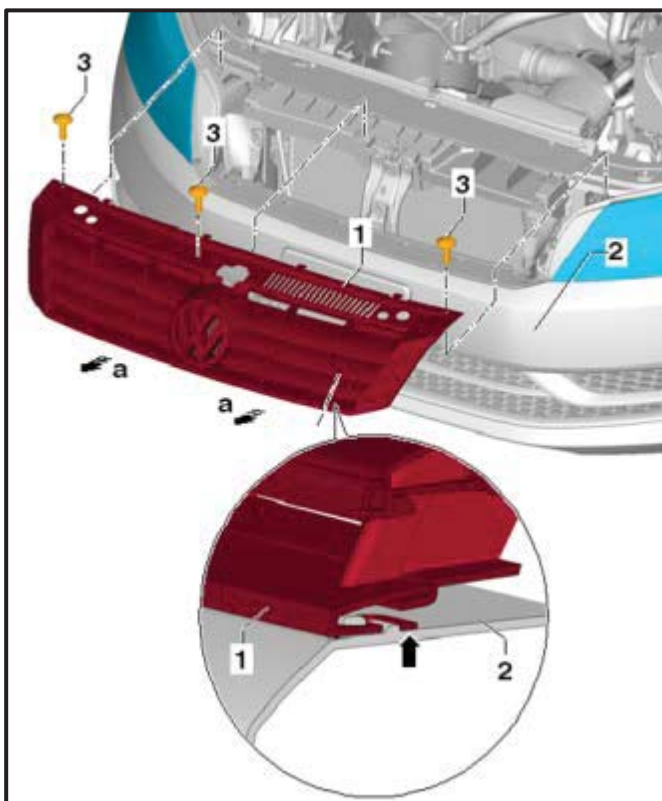
Section E – Headlight Assemblies Removed

⚠ Note: This procedure is to be performed on one or both affected headlights.

⚠ Note: Removing and installing the left headlight is shown in the illustrations. Removing and installing the right headlight is identical.

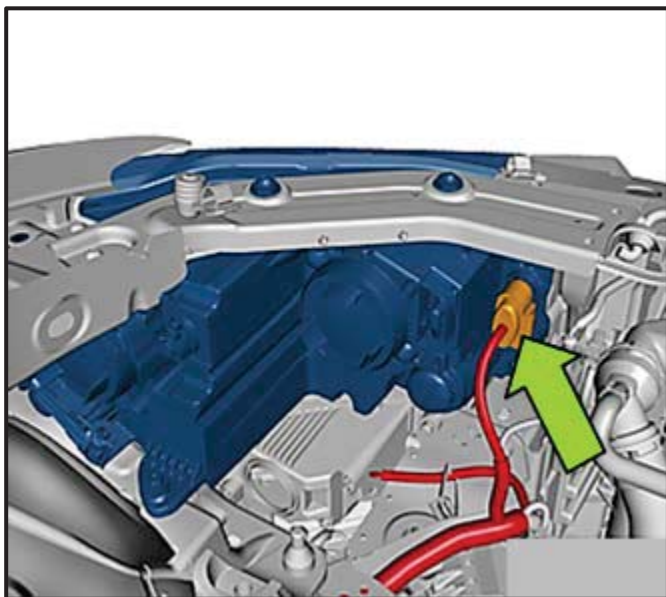
⚠ Note: Tape off the edges on the headlight and on the body when removing and installing headlights.

⚠ Note: The headlight lens can be damaged due to improper handling. Protect the headlight from scratches by covering your working surface with a clean cloth or similar material.

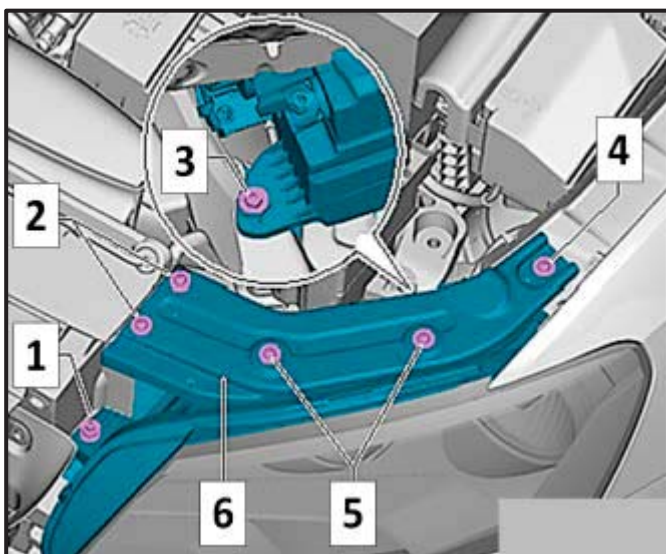


⇐ Remove bolts <3>.

⇐ Pull the radiator grille <1> parallel out of the retainers <arrow> on the front bumper cover <2> in <direction of arrow a> and set aside.



⇐ Disconnect the connector <arrow> from each affected headlight.



⇐ Remove screws <2, 4 & 5> from the top of each affected headlight.

⇐ Remove screws on the front <1> and on the back <3> of the headlight.



Tip: Carrier <6> does not need to be removed unless preferred.

- Carefully remove the headlight assembly from the vehicle.



Tip: It may be necessary to pivot the headlight assembly to remove it from the vehicle.



⇐ Protect painted surfaces from damage by installing masking tape appropriately as shown.

Continue to Section F

Section F – Headlight Socket Removal



⚠ Note: Set the headlight assembly on a soft pad to avoid damaging the headlight lens.

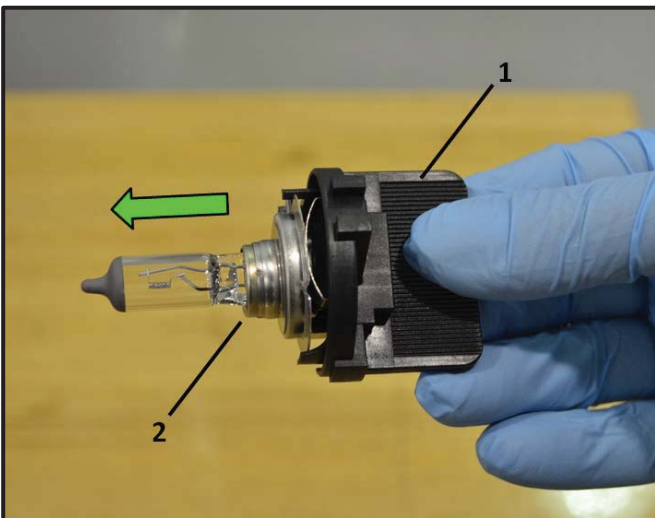
⚠ Note: This procedure is to be performed on one or both affected headlights.

⚠ Note: Reworking only one headlight is shown. Reworking either headlight is identical.

⇐ Remove low-beam cover <arrow>.



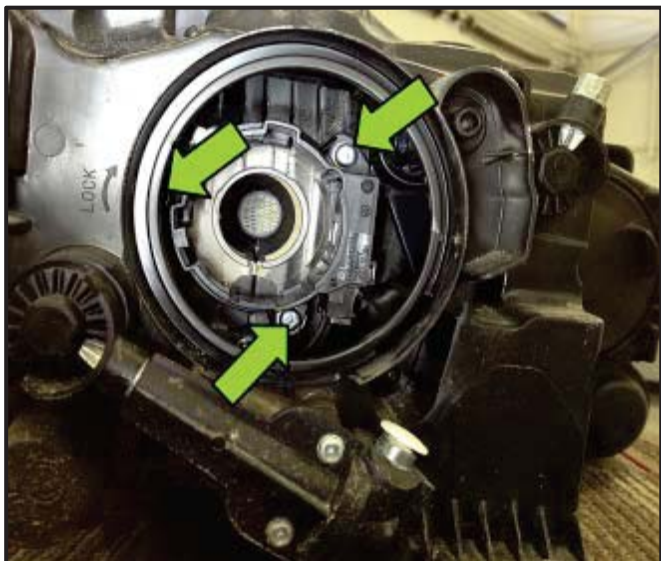
⇐ Remove the low beam headlight bulb retainer <arrow> by turning the retainer to its “keyed” position and sliding outward.



⇐ Remove the bulb <2> from the retainer <1> by pulling the direction of arrow.

⚠ Note: Do not touch the glass of the bulb. Fingers will leave traces of grease on the glass which, when the light is switched on, will evaporate and cloud the glass.

⚠ Note: Replacement of the headlight bulb is not covered under this action.



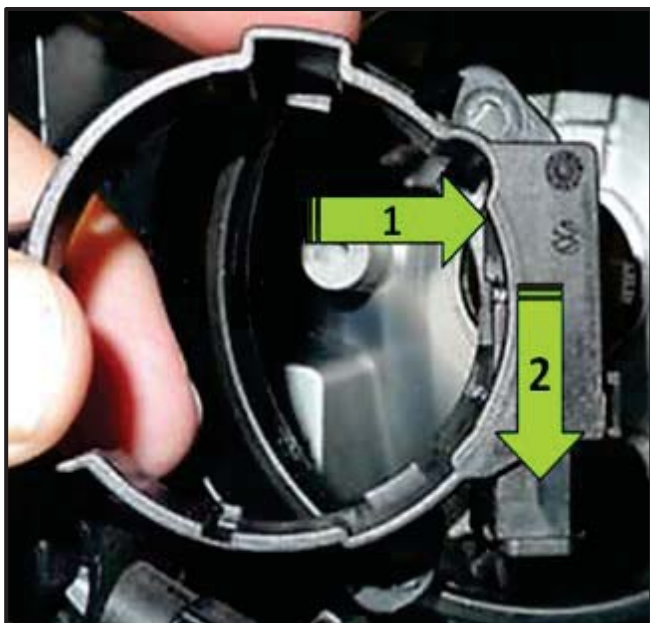
- ⇐ Using a magnetized #1 Phillips screwdriver, remove the three screws <arrows> for the Headlight Socket Retaining Ring and remove ring from headlight housing.



Tip: For better access to the screws, the headlight reflector adjustment can be changed.



Note: DO NOT ALTER LOWER ADJUSTMENT (white cap)!



- ⇐ Push the top side of the connector inward <arrow 1>, then push the connector downward <arrow 2> and out of the retaining ring.

Continue to Section G

Section G – Headlight Wiring Repair



Note: This procedure is to be performed on one or both affected headlights.



Note: Reworking only one headlight is shown. Reworking either headlight is identical.



- ⇐ Cut the repair harness from kit 561998109 in half <arrow>.

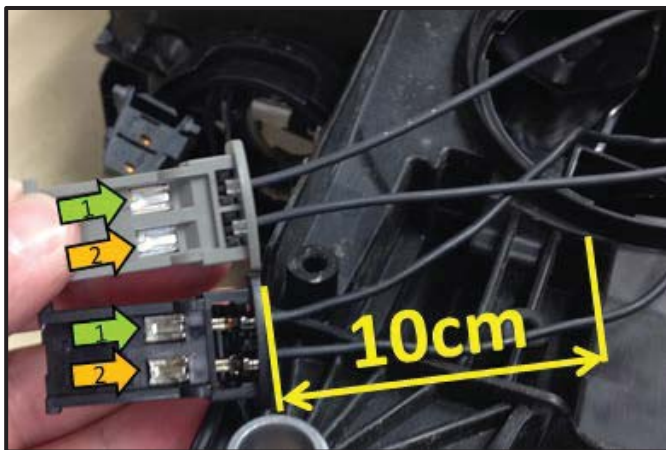
- Use -VAS 1978/3- wire stripper or equivalent to strip 6mm of insulation from the end of each wire.



- ⇐ Crimp a butt connector (000 979 941) onto each repair harness wire <as shown> using -VAS 1978/1-2- crimping tool pliers with -VAS 1978/1-1- crimp head in the 0.5mm-1.0mm (red dot) setting.



- ⇐ Turn headlight upside down and remove access cover <arrow>.



- Pull out the black wiring harness.
- Compare the connectors to determine matching wire. Perform repair on one wire at a time in order to avoid crisscrossing of wires.



Note: When cutting the original wiring, make sure to cut old wire at least 10cm from connector to ensure clean copper is obtained.

- ⇐ Cut off 10cm of the black wiring harness with the -VAS 1978/3- or equivalent side cutting pliers <as shown>.

- Set the -VAS 1978/3- wire stripper to 6mm and strip insulation from the end of each wire.



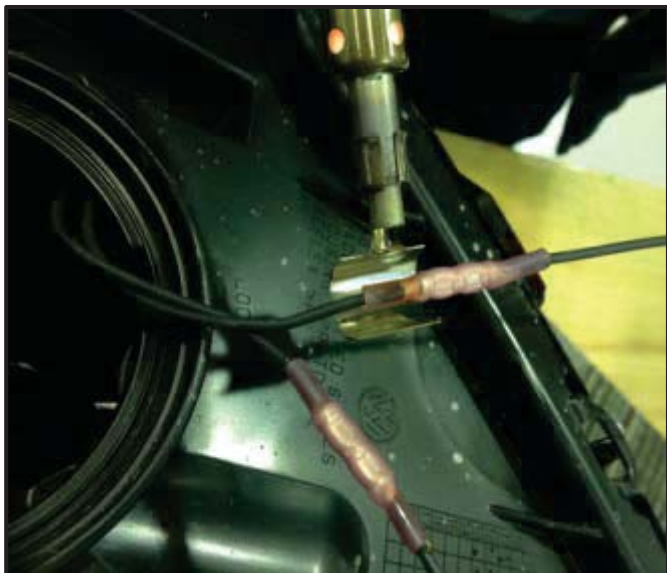
- ⇐ Crimp the new connector repair harness onto the headlight wiring <as shown> using -VAS 1978/1-2- crimping tool pliers with -VAS 1978/1-1- crimp head in the 0.5mm-1.0mm (red dot) setting.



- ⇐ Set up the UTI-100SI Ultratorch tool or equivalent from the -VAS 1978B- wire harness repair kit <as shown>.



Tip: Follow manufacturer instructions provided with the UTI-100SI Ultratorch tool for proper set up, safety and use of the tool.



- ⇐ Using the UTI-100SI Ultratorch tool, heat the open end of each butt connector <as shown> until tubing shrinks over the wire and the glue starts to protrude from the butt connector.



Note: Do not overheat butt connector to a point where the glue no longer provides a water tight seal

- Route repaired harness back through headlight.

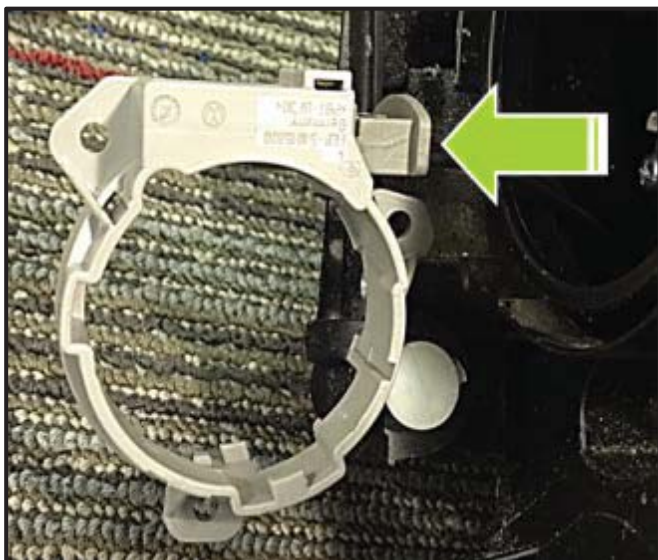


⇐ Reinstall protective cover <arrow> and turn headlight over.



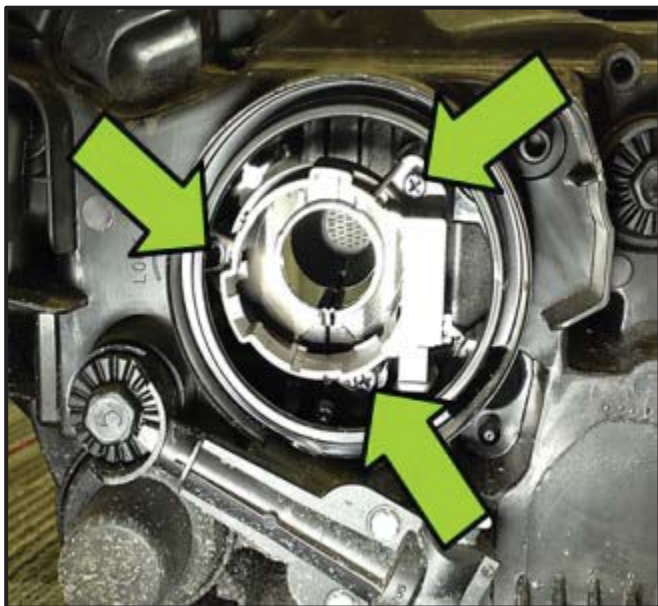
Note: Ensure proper seating of the cap to prevent water entry into the headlight.

Continue to Section H



Section H – Assembly of Repair Kit

⇐ Insert the connector into the new retaining ring from kit 561998109 in <direction of arrow> until you hear an audible click.



⇐ Install retaining ring into headlight and reinstall the three screws <arrows>.



⇐ Reinstall the bulb onto the new retainer from kit 561998109 <as shown>.



Note: Do not touch the glass of the bulb. Fingers will leave traces of grease on the glass which, when the light is switched on, will evaporate and cloud the glass. Ensure that the bulb socket is properly seated and locked into the headlight housing.



Note: Replacement of the headlight bulb is not covered under this action.



⇐ Install bulb retainer assembly into headlight by locking into position as shown <left>.



⇐ Reinstall protective cover <arrow> and firmly seat into position.



Note: Ensure proper seating of the cap to prevent water entry into the headlight.

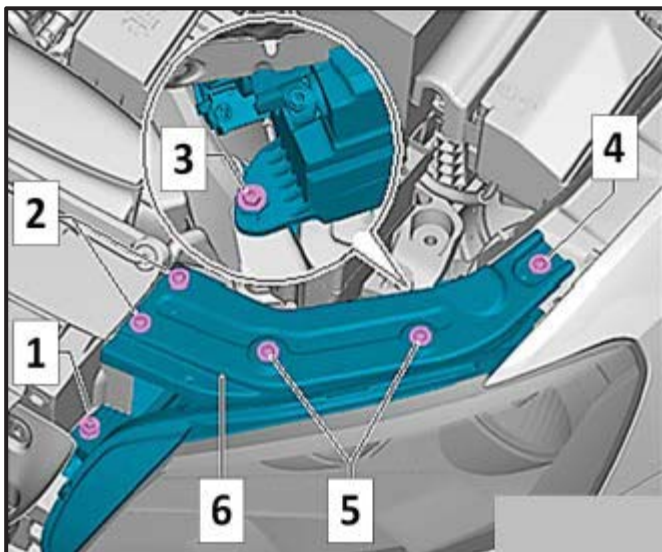
Continue to Section I

Section I – Headlight Reinstallation

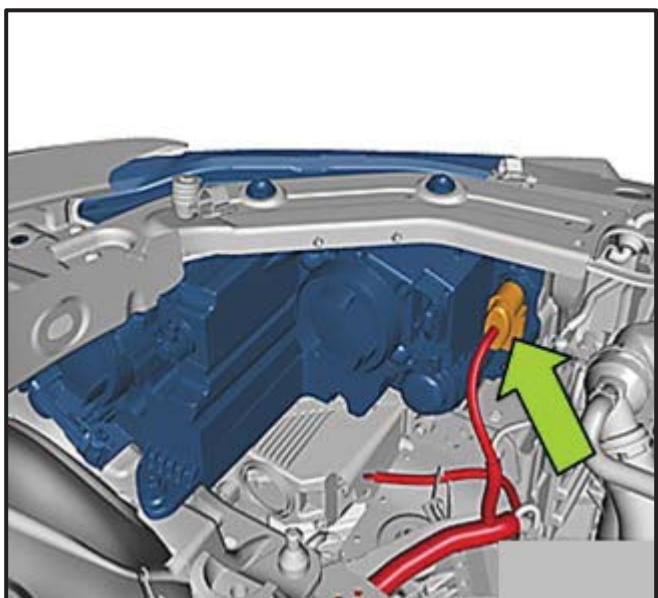
- Carefully reinsert the headlight assembly back into the vehicle.
- Loosely install all headlight mounting screws.
- Remove protective tape from body panel while headlight assembly is loose.

⇐ Position the headlight to properly align with the bumper and fender <arrows>.





- ⇐ Tighten screws on the front <1> and on the back <3> of the headlight.
- ⇐ Tighten screws <2, 4 & 5> from the top of each headlight.



- ⇐ Reconnect the connector <arrow> onto each headlight.

Continue to section J



Section J – Hood Bumper Replacement

- ⇐ Remove the hood bumpers <arrows>.



Note: In the following step the two rearward mounted hood bumpers <arrows> are replaced and adjusted. The remaining hood bumpers <circles> remain untouched during this procedure.



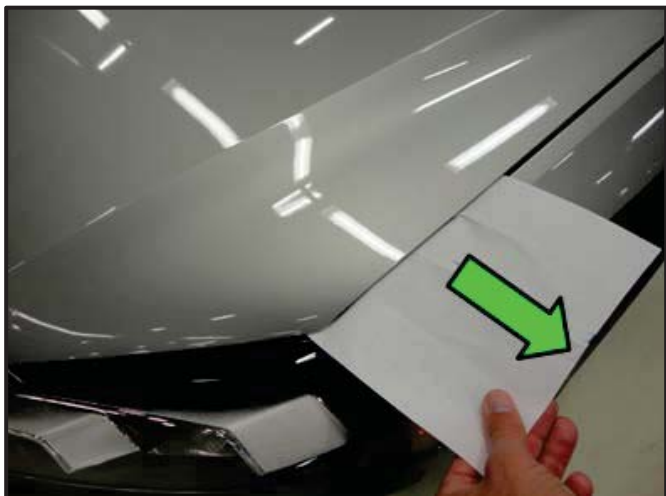
- Install replacement hood bumpers p/n 8T0 827 249.
- ⇐ Adjust each new hood bumper so that 2 to 3 threads are visible <circle>.



- ⇐ Back each bumper out $\frac{1}{2}$ to $\frac{3}{4}$ of a turn <arrow>.

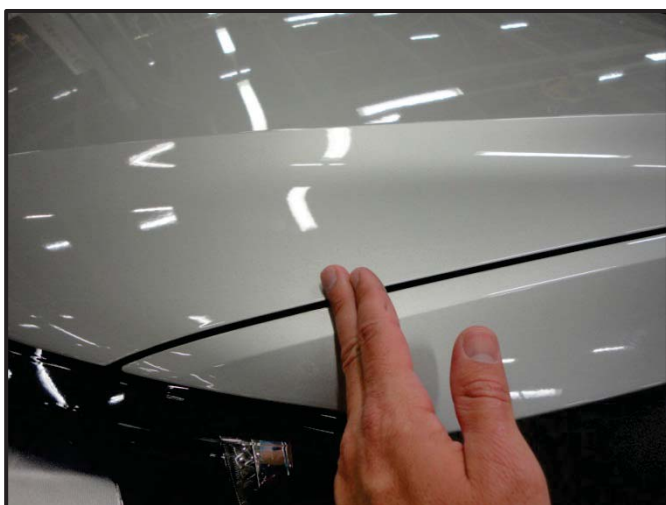


- ⇐ The contact point between the hood bumper and the fender is approximately where shown <circle>.
- ⇐ Lay a standard sheet of printer paper (or equivalent) over the contact point <as shown>.
- Carefully close and latch the hood.



⇐ Attempt to pull the paper out from under the hood bumper <arrow>.

- If the paper cannot be removed when pulled with low force, solid contact between the hood bumper and the contact point is made.
- If the paper slides out easily re-open the hood, adjust the bumper an additional ¼ turn out, then retest the adjustment using the paper. **Repeat this step as necessary until proper contact is made.**



⇐ Inspect the alignment between the hood and each fender <as shown>.

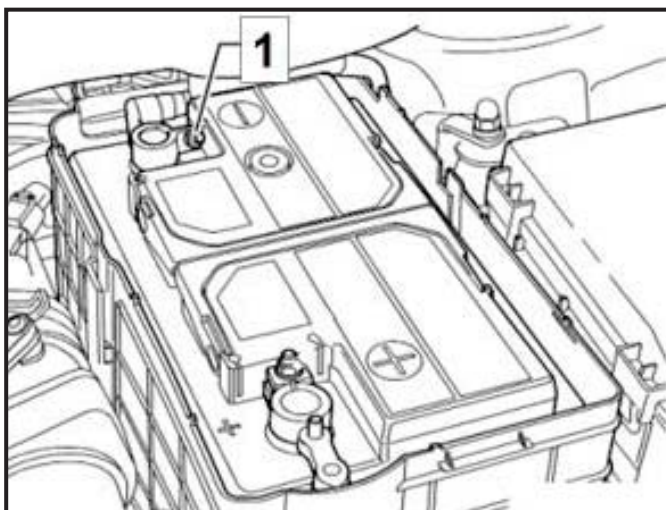
- Open and close the hood 2 -3 times to verify proper latch and release operation.
- Adjust each hood bumper as necessary to allow for proper alignment and latch function.



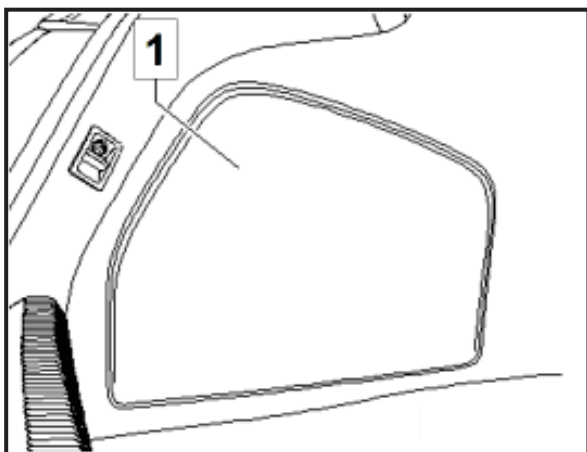
Note: Bumpers will need to be slightly adjusted to accommodate contact with the engine compartment inner fender/bracket, alignment between the hood and the fender, and proper functionality of the hood latch.

Continue to Section K

Section K – Reconnect Battery

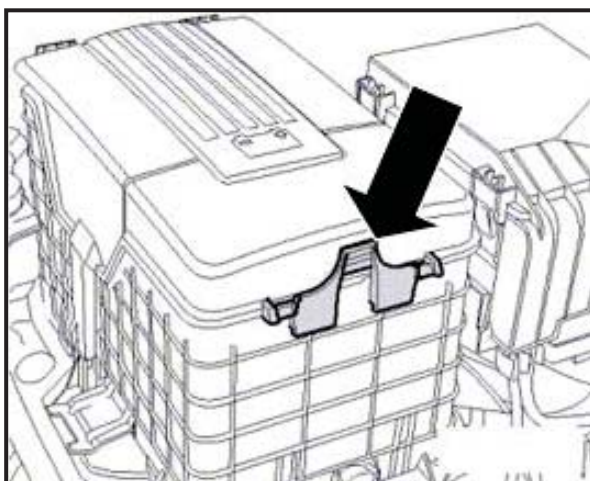


⇐ Connect battery terminal clamp of Ground (GND) wire <1> to battery Ground (GND) terminal and torque to 6Nm.



For 3.6L

- ⇐ Reinstall battery service cover <1> and clip properly in place.
- Close trunk.



For all other vehicles

- ⇐ Reinstall battery box cover and close locking mechanism -arrow-
- Turn the ignition switch on.
- Clear DTC's using Guided Functions.
- Reset comfort features (window basic settings, clock, etc.)
- Turn the ignition switch off.
- ⇐ Close hood

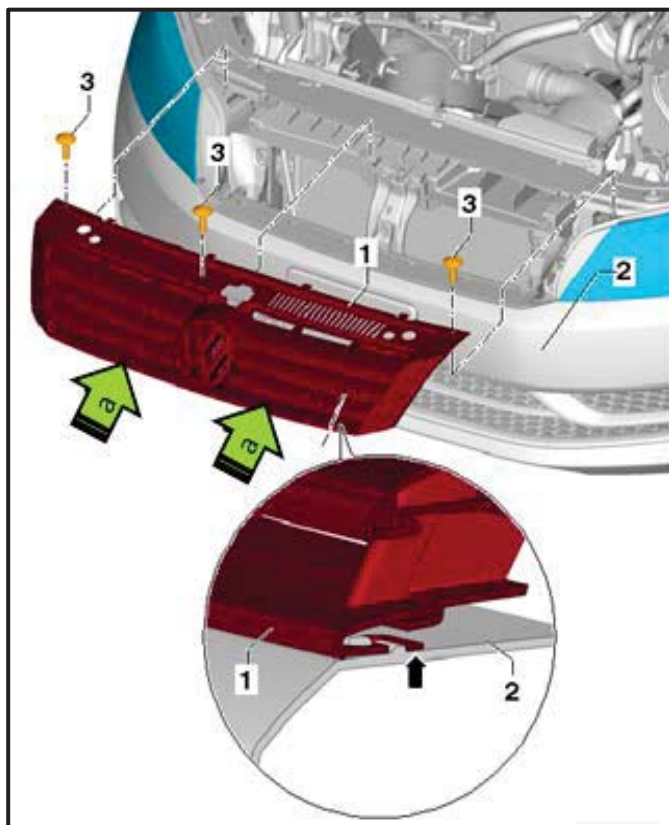
For vehicles that required headlight removal and repair - Continue to Section L

For vehicles that DID NOT require headlight repair – Continue to Section M.



Section L – Headlight Aiming

- Turn the ignition switch on.
- Turn the headlights on.
- ⇐ Re-aim the headlights using the HOP82005 (or equivalent).
- Switch off the headlights.
- Switch off the ignition.



⇐ Carefully reinsert the radiator grille <1> parallel into the retainers <arrow> on the front bumper cover <2> in <direction of arrow a>.

⇐ Reinstall bolts <3>.

Work Complete – Continue to Section M

Section M – Campaign Completion Label and Parts Return/Disposal

Install Campaign Completion Label

- Fill out and affix Campaign Completion label, part number CAMP 010 000, next to the vehicle emission control information label



Tip: Ensure Campaign Completion label does not cover any existing label(s)

- Close the hood.

Parts Return/Disposal

Properly destroy or dispose of removed parts in accordance with all state and local requirements, unless otherwise indicated and/or requested through the Warranty Parts Shipping Portal (WPSP) for U.S. and SAGA for Canada.

ALL WORK IS COMPLETE