VOLVO CAR SERVICE AND PARTS BUSINESS



Technical Journal

TITLE: Climate system, unusual noise from dashboard area

| REF NO: | ISSUING DEPARTMENT: | CAR MARKET: | | |
|---------------------|----------------------------|-------------------------|--------------|--|
| TJ 32267.1.0 | Technical Service | United States and Canac | | |
| 3 US 7 | PARTNER: | ISSUE DATE: | STATUS DATE: | |
| | 2510 Volvo Car USA | 2017-03-20 | 2017-03-23 | |
| FUNC GROUP: 8730 | FUNC DESC: Climate unit | Page ⁻ | 1 of 19 | |

"Right first time in Time"

Attachment

| File Name | File Size |
|--------------------|------------|
| Chirping noise.mp4 | 4.8272 MB |
| Noise.MOV | 1.9347 MB |
| TJ 32267.pdf | 19.7758 MB |

Vehicle Type

| Туре | Eng | Eng Desc | Sales | Body | Gear | Steer | Model Year | Plant | Chassis range | Struc Week Range |
|------|-----|-------------|-------|------|------|-------|------------|-------|-----------------|---------------------|
| 234 | | | | | | | 2017-2018 | | 0000350-0999999 | 201617-999952 |
| 235 | | | | | | | 2017-2018 | | 0000160-0999999 | 201624-999952 |
| 236 | | | | | | | 2017-2018 | | 0000098-0999999 | 201646-999952 |
| 256 | | | | | | | 2016-2018 | | 0000561-0999999 | 201505-999952 |

CSC Customer Symptom Codes

| Code | Description |
|------|--------------------------------------|
| D5 | Climate control system/Unusual noise |

VST Operation Number

| VST Operation Number | Description |
|----------------------|------------------------------------------|
| 98656-2 | Heater exchanger replace, acc to TJ32267 |

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DTC Diagnostic Trouble Codes

Text

DESCRIPTION:

Unusual noise described as a chirping noise may be heard coming from dashboard upper mid area. Normally it can be heard when the engine is cold and the engine revs between idle and 2500rpm. This is due to some small air bubbles in the upper part of the heater core. New and improved heater core will be introduced in production from approx. 2017w22.

SERVICE:

In case of customer complaints, replace the heater core according to the attached instruction.

VEHICLE REPORT:

Yes, please submit a Vehicle Report if the service solution described in this TJ has no effect. Use concern area "Vehicle Report" and sub concern area "Support not needed", use function group 8730.

To view TJ attachments continue to next page. This TJ has one attachment and two sound files.

| VOLVO | olvo Car Customer Service | TJ 32267 |
|--------|---------------------------|---------------------------|
| Title | Heat exchanger | Page 1 (17) |
| Action | Product fix | Operation number: 98656-2 |

Affected vehicles

Γ

| Model year | Model | Steering |
|------------|-------------------|----------|
| 2017 | S90 (17-) | L.H.D |
| 2017 | V90 (17-) | L.H.D |
| 2017 | V90 Cross Country | L.H.D |
| 2016, 2017 | XC90 (16-) | L.H.D |

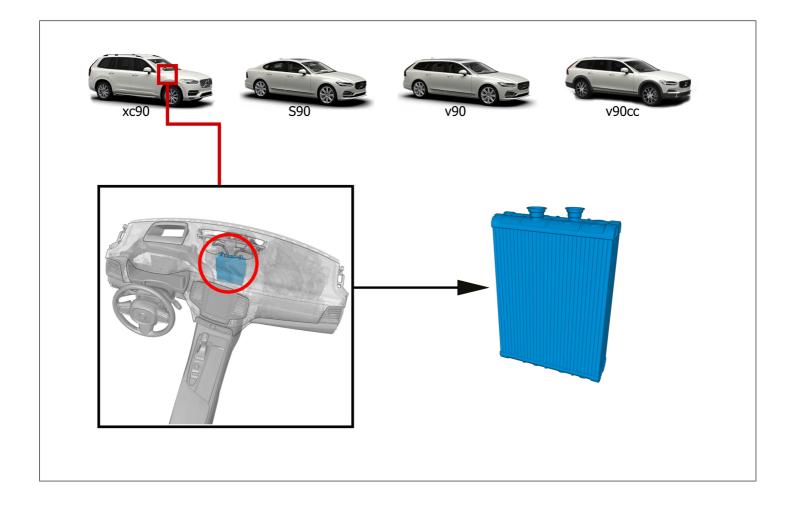
Materials

| Materials | Qty. | Part No. | Notes |
|----------------|------|----------|-------|
| Clamp | 2.0 | 31404836 | |
| O-ring | 2.0 | 8693268 | |
| Heat exchanger | 1.0 | 31694082 | |

Equipment

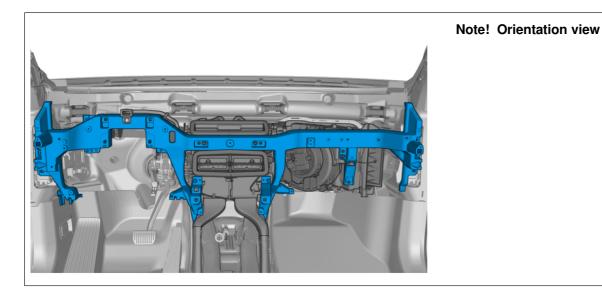
| Designation | Part No. |
|---------------------------|----------|
| Electrician's screwdriver | |
| Tape measure | |
| File | |

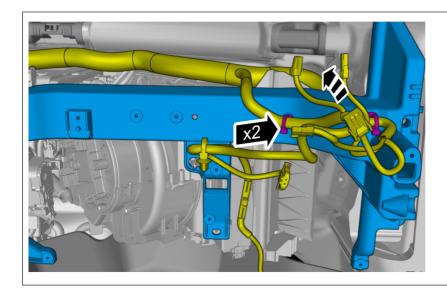
Removal



Color symbols

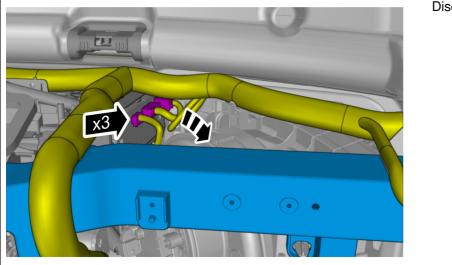
| Note! This colour chart displays (in colour print and electronic version) the importance of the different colours used in the images of the method steps. 1. Used for focused component, the component with which you will do something. 2. Used as extra colors when you need to show or differentiate additional parts. 3. Used for attachments that are to be removed/installed. May be screws, clips, connectors, etc. 4. Used when the component is not fully removed from the vehicle but only hung to the side. 5. Used for standard tools and special tools. 6. Used as background color for vehicle components. |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Drain cooling system, draining, filling, and bleeding, refer to: Cleaning, Inspection and Adjustment 2 - Engine with mountings and equipment 26 - Cooling system 261 - radiator and connections |
| Remove the dashboard, refer to: Removal, replacement and installation 8 - Body and interior 88 - Interior equipment 881 - instrument and radio panel |



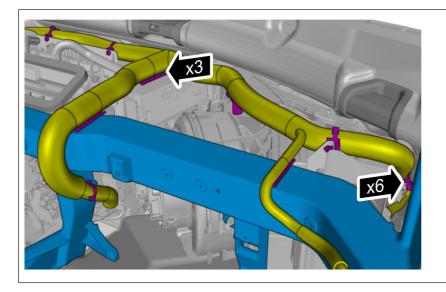


Caution! The number of connectors, cables and cable ties may vary depending on the vehicle specification.

Remove the cable harness clips. Fold marked part to one side.

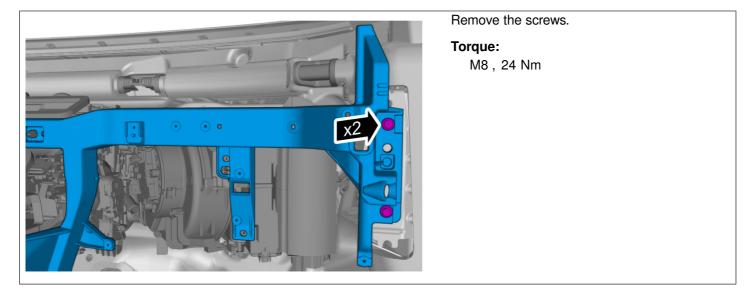


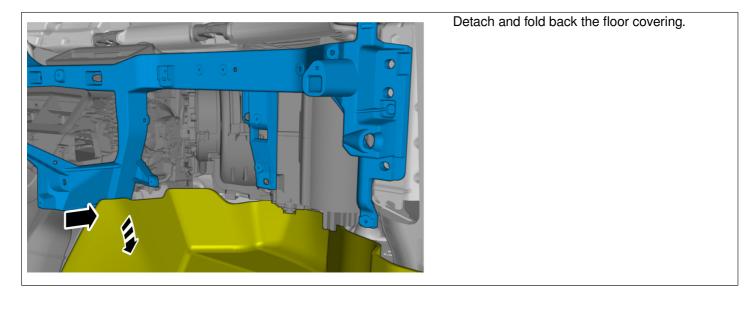
| Disconn | ect the | connec | tors. | | |
|---------|---------|--------|-------|--|--|
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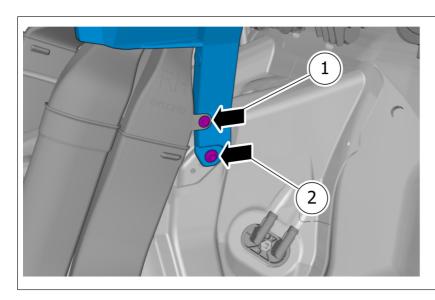


Caution! The number of connectors, cables and cable ties may vary depending on the vehicle specification.

Remove the cable harness clips.

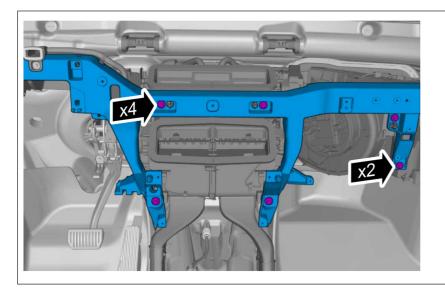






Remove the screws.

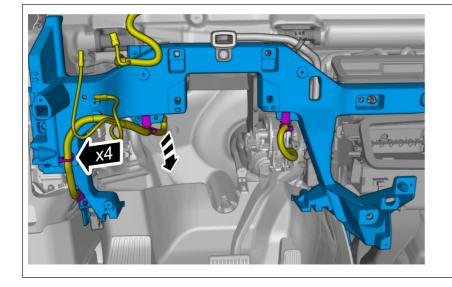
- ^{1 .} **Torque:** M5 , 5 Nm
- ² · **Torque:** Cross member, to Body,10 Nm



Remove the screws.

Torque:

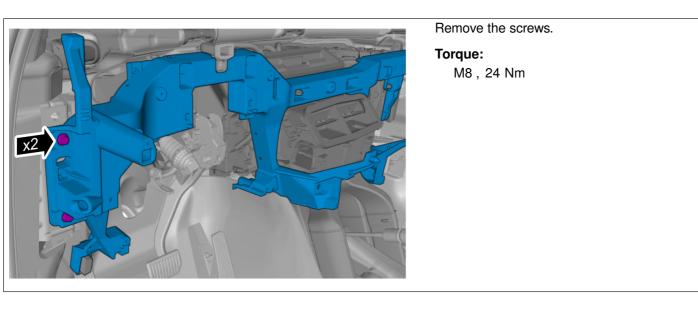
Cross member, to Climate unit, 7 Nm

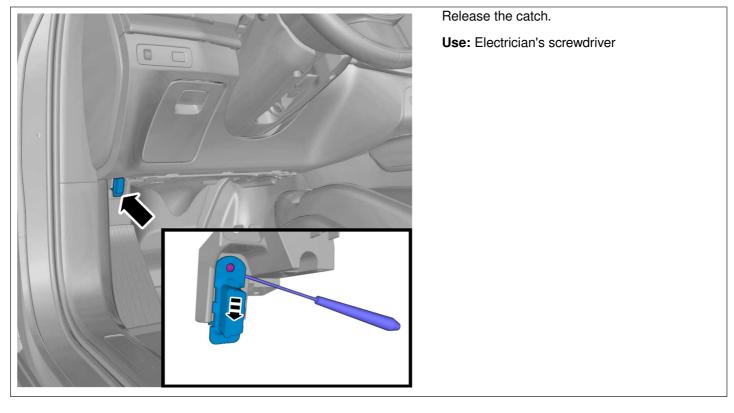


Caution! The number of connectors, cables and cable ties may vary depending on the vehicle specification.

Remove the cable harness clips. Fold marked part to one side.

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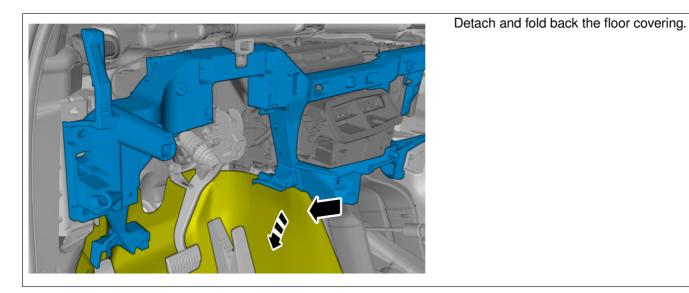


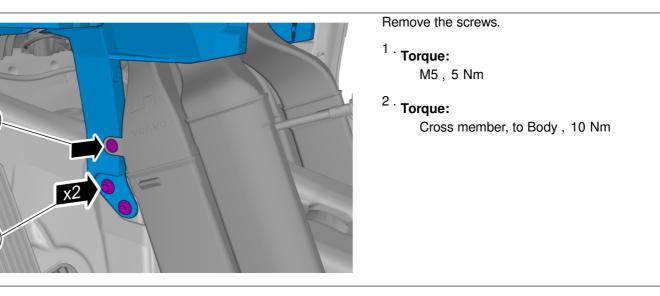


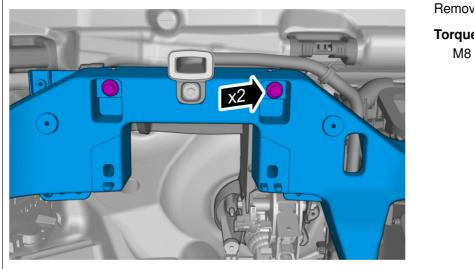
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2

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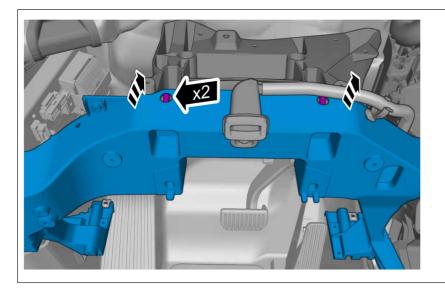






Remove the screws. Torque: M8 , 24 Nm

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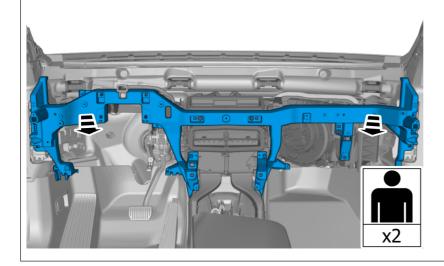


Caution! Make sure that the component is correctly located on the locating dowels.

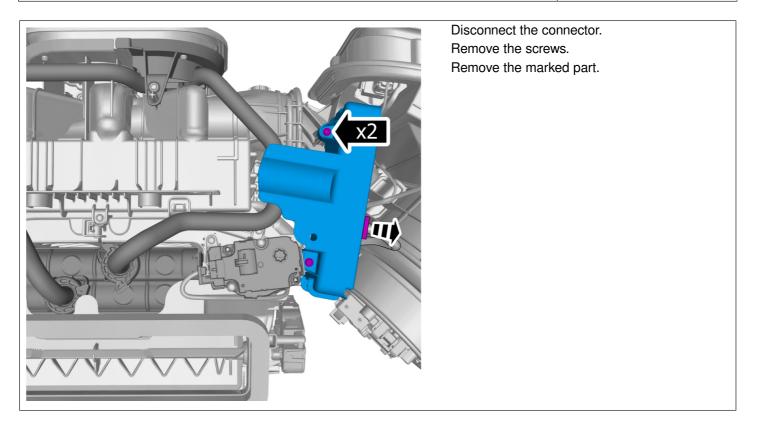
Caution! Make sure that the wiring harness does not catch.

Note! This step requires the aid of another technician.

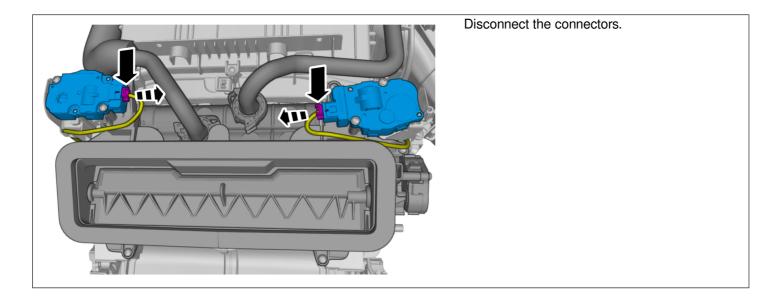
Remove the part carefully Remove the marked part.



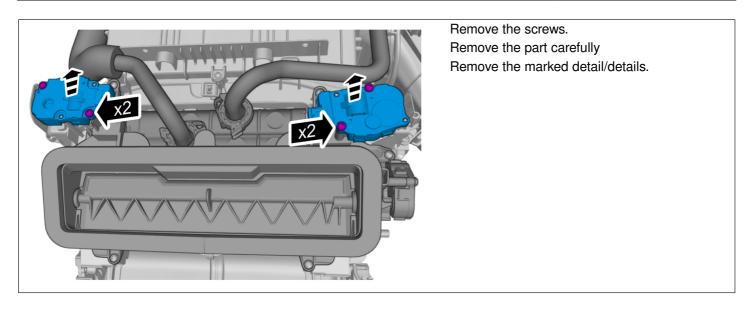
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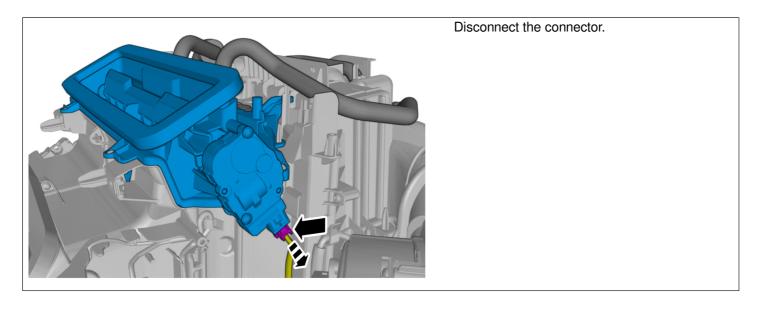
| Vehicles with 4-zone Air Conditioning system |
|----------------------------------------------|
| AC |

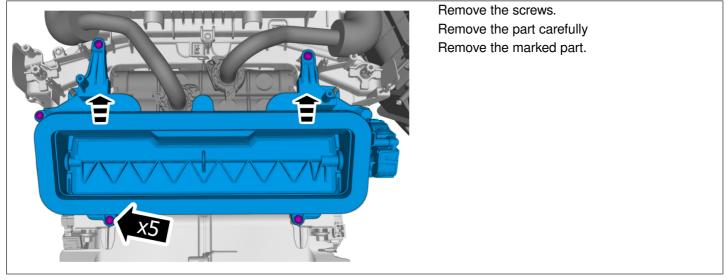


Page 11 (17)

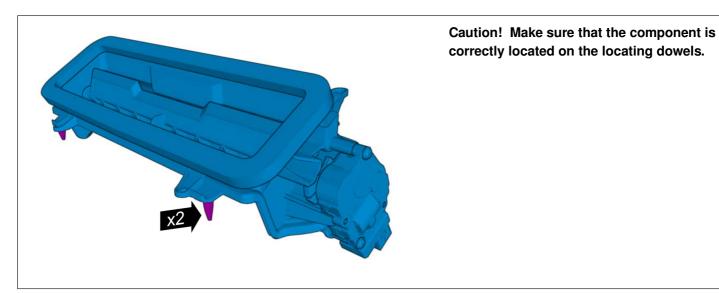


All vehicles

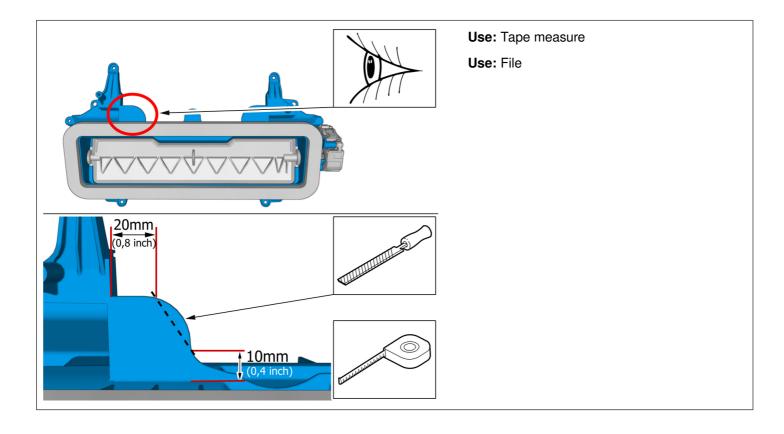




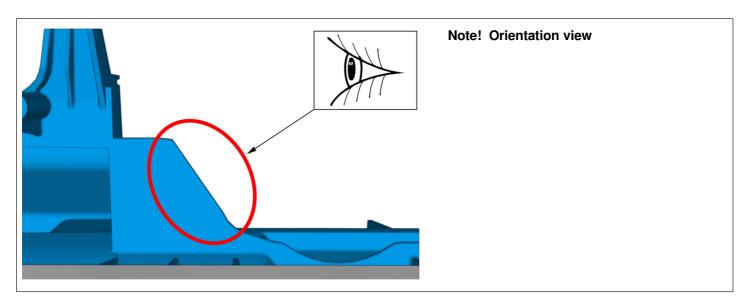
Page 12 (17)

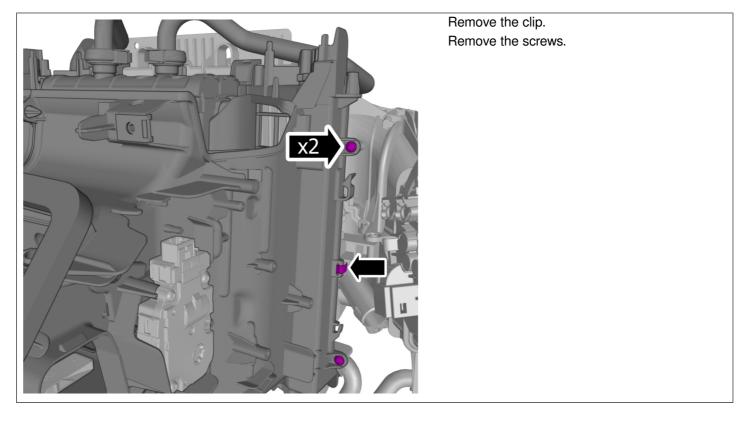


Preparation

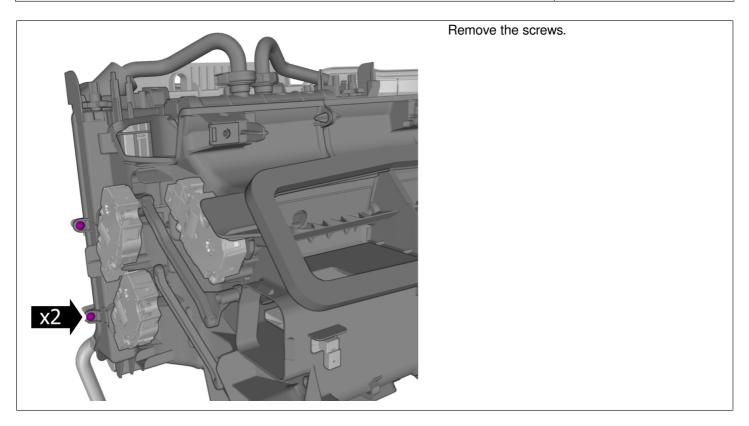


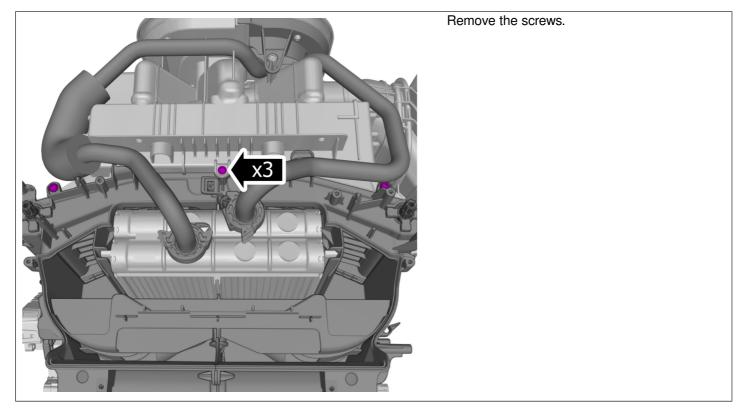
Page 13 (17)

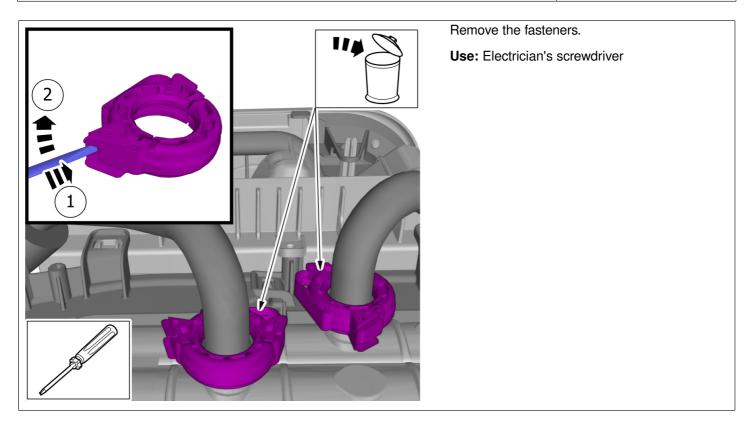


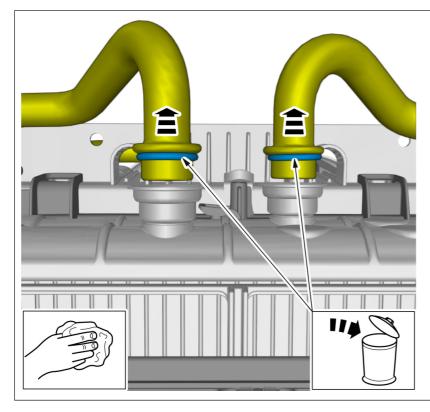


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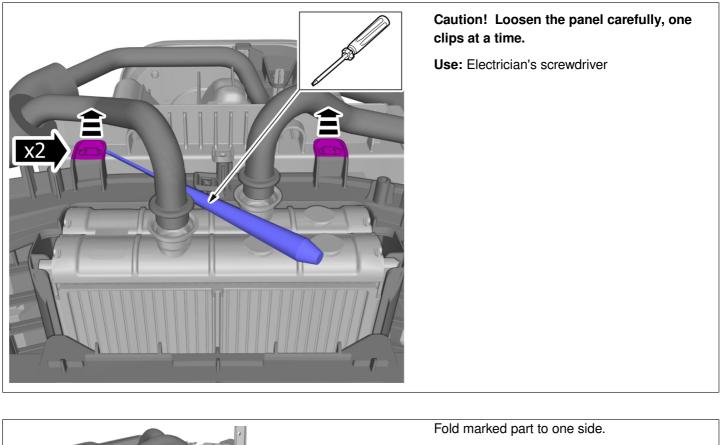


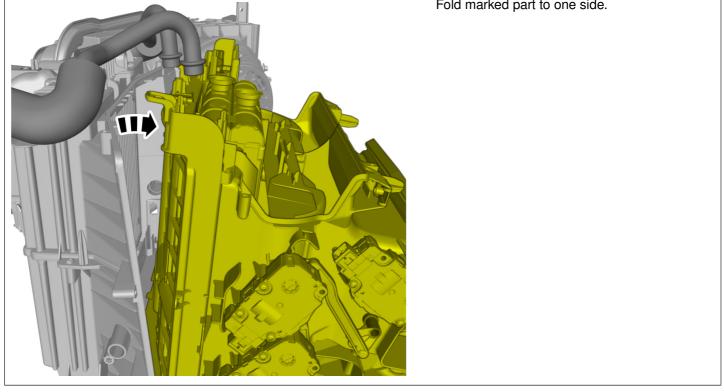


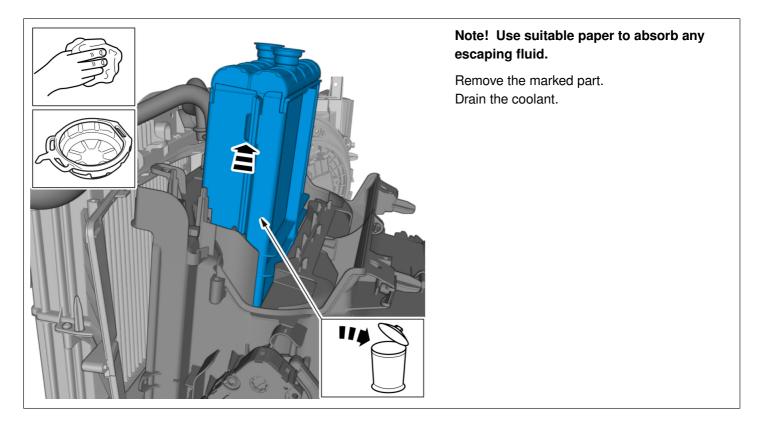
Caution! Make sure that the components are not forcibly bent.

Note! Use suitable paper to absorb any escaping fluid.

Undo the hoses from the connections. Remove the marked detail/details.







Installation

To install, reverse the removal procedure.

| Fill cooling system, draining, filling, and |
|---------------------------------------------|
| bleeding, refer to: |
| Cleaning, Inspection and Adjustment |
| 2 - Engine with mountings and equipment |
| 26 - Cooling system |
| 261 - radiator and connections |
| |
| Calibrate according to: Diagnostics / |
| Components / Control modules/ Climate |
| Control Module (CCM) / Diagnostic sequences |
| Calibrating damper actuators |