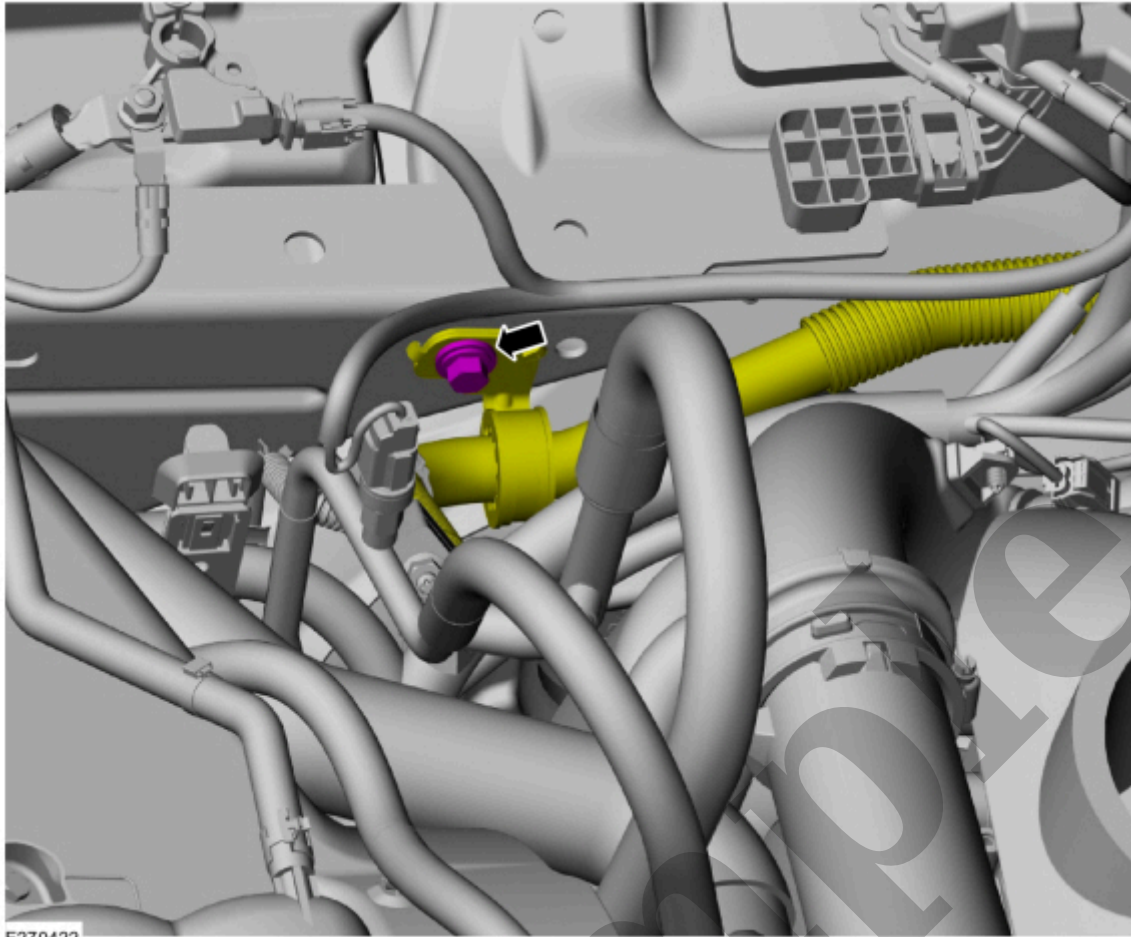


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## 1993 FORD Scorpio Wagon OEM Service and Repair Workshop Manual

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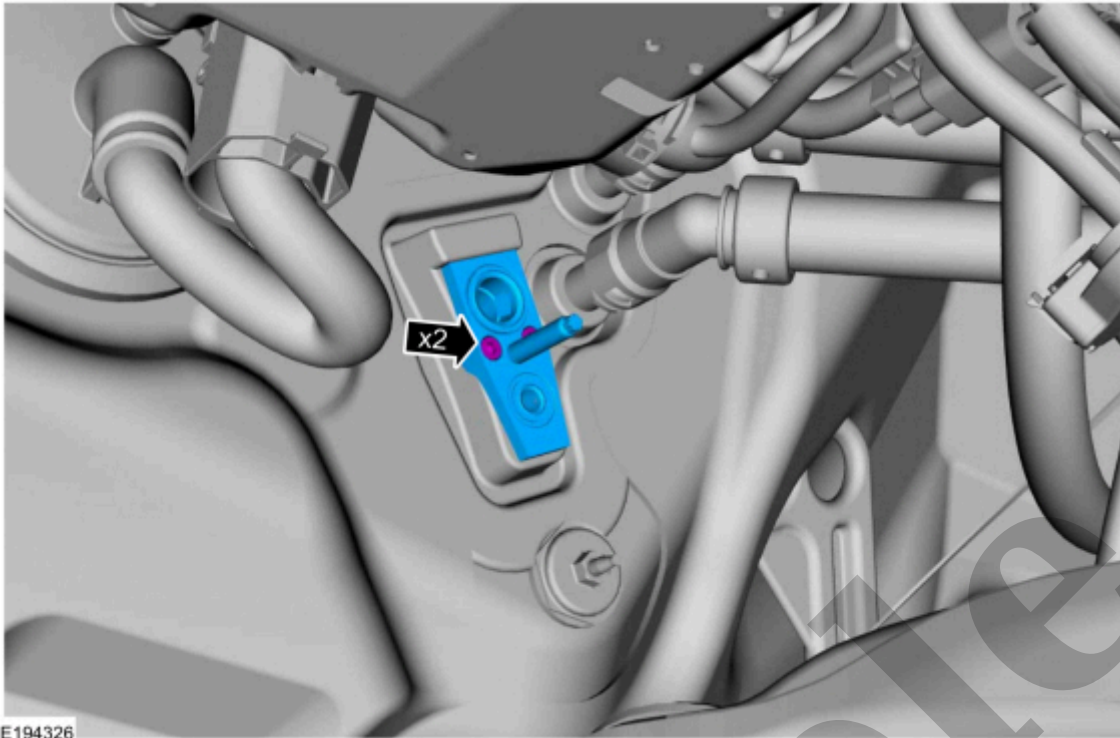
4. Remove the RHF (right-hand front) fender splash shield.

Refer to: [Fender Splash Shield](#) (501-02 Front End Body Panels, Removal and Installation).

5. Remove the nut and position the thermostatic expansion valve manifold and tube assembly aside.

- Make sure to cover any open ports to prevent debris from entering the system.

***Torque*** : 80 lb.in (9 Nm)



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## Installation

1. To install, reverse the removal procedure.

### 2. NOTICE

Only use the specified material to lubricate the seals.

Install and lubricate new O-ring seals. Refer to the appropriate Specifications in Group 412.

3. Lubricate the refrigerant system with the correct amount of clean POE oil. Refer to the appropriate Refrigerant Oil Adding procedure in Group 412.

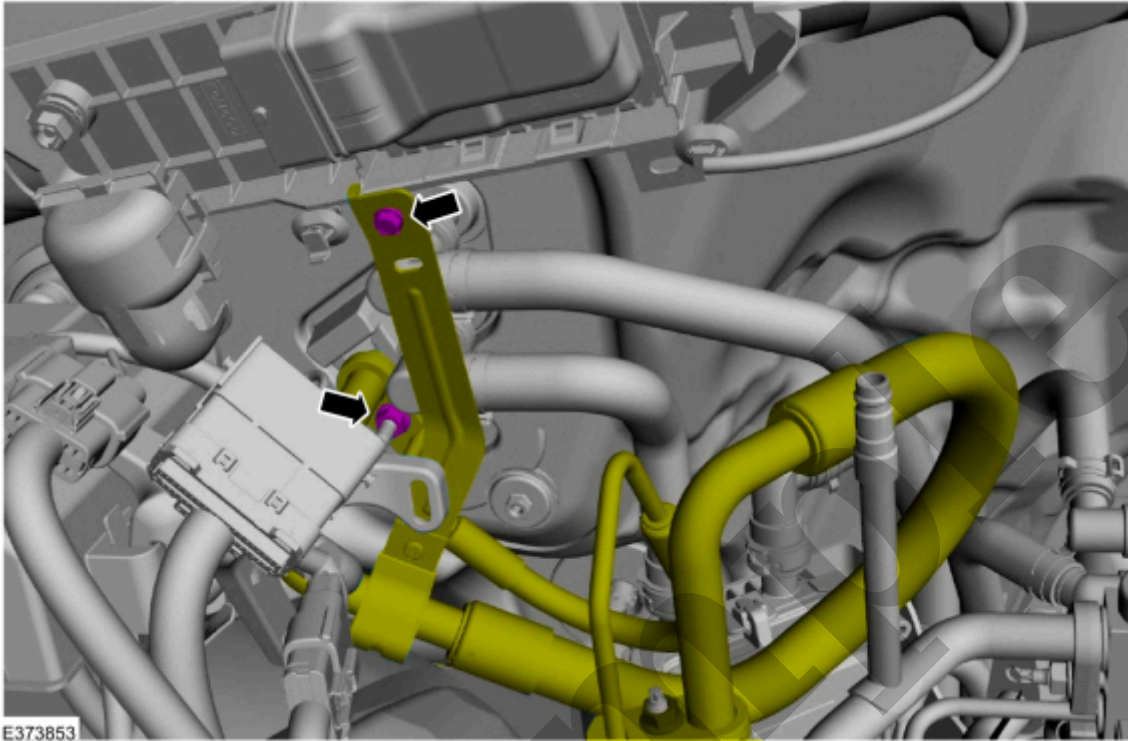
Copyright © Ford Motor Company

**Torque** : 133 lb.in (15 Nm)

- Remove the support bracket retainer and position the manifold and tube assembly aside.

**Torque** : 93 lb.in (10.5 Nm)

- Make sure to cover any open ports to prevent debris from entering the system.



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5. Remove the bolts and the thermostatic expansion valve.

- Make sure to cover any open ports to prevent debris from entering the system.

**Torque** : 71 lb.in (8 Nm)

## Thermostatic Expansion Valve Manifold and Tube Assembly - 2.7L EcoBoost (238kW/324PS)

<b>412-00 Climate Control System - General Information</b>	<b>2022 F-150</b>
<b>Removal and Installation</b>	<b>Procedure revision date: 10/5/2020</b>

### Thermostatic Expansion Valve Manifold and Tube Assembly - 2.7L EcoBoost (238kW/324PS)

#### Removal

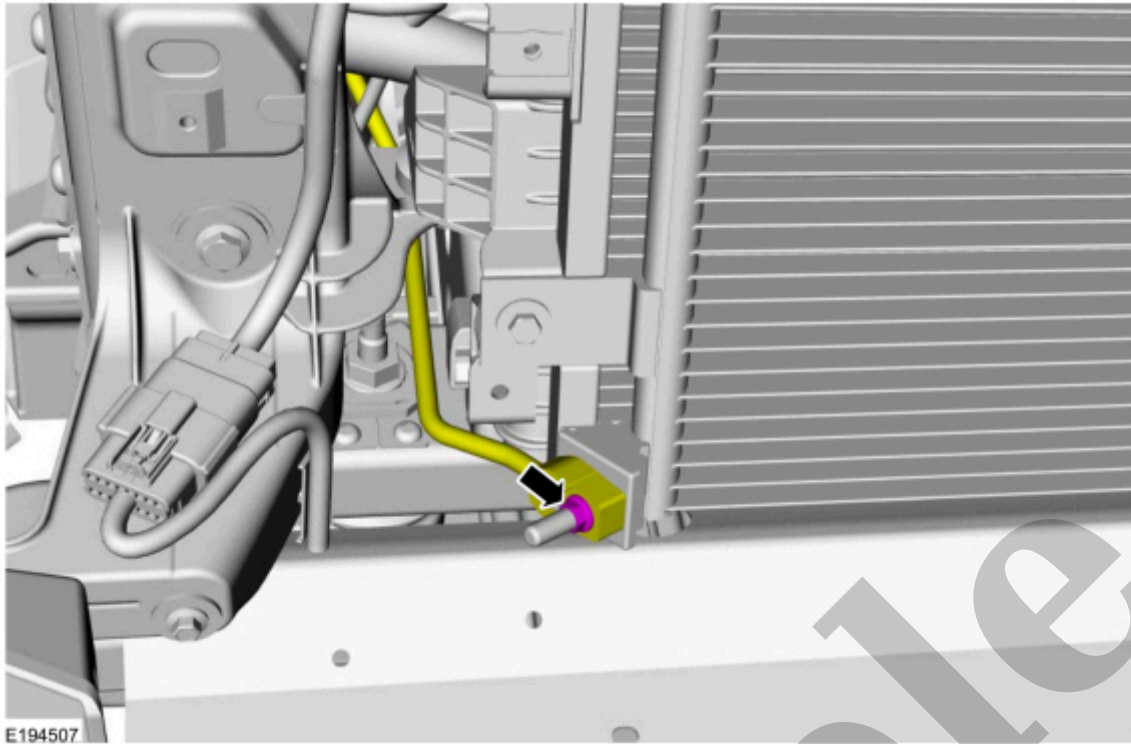
##### NOTICE

During the removal or installation of components, cap, tape or otherwise appropriately protect all openings and tubes/fittings to prevent the ingress of dirt or other contamination. Remove caps, tape and other protective materials prior to installation.

##### NOTE

Removal steps in this procedure may contain installation details.

1. Recover the refrigerant. Refer to the appropriate Recovery procedure in Group 412.
2. Remove the radiator grille.  
Refer to: [Radiator Grille](#)(501-08 Exterior Trim and Ornamentation, Removal and Installation).
3. Remove the retainers and position the RH (right-hand) splash shield aside.



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5. Remove the following items:

- Remove the battery tray.

Refer to: [Battery Tray](#)(414-01 Battery, Mounting and Cables, Removal and Installation).

- Remove the RH (right-hand) air cleaner outlet pipe.

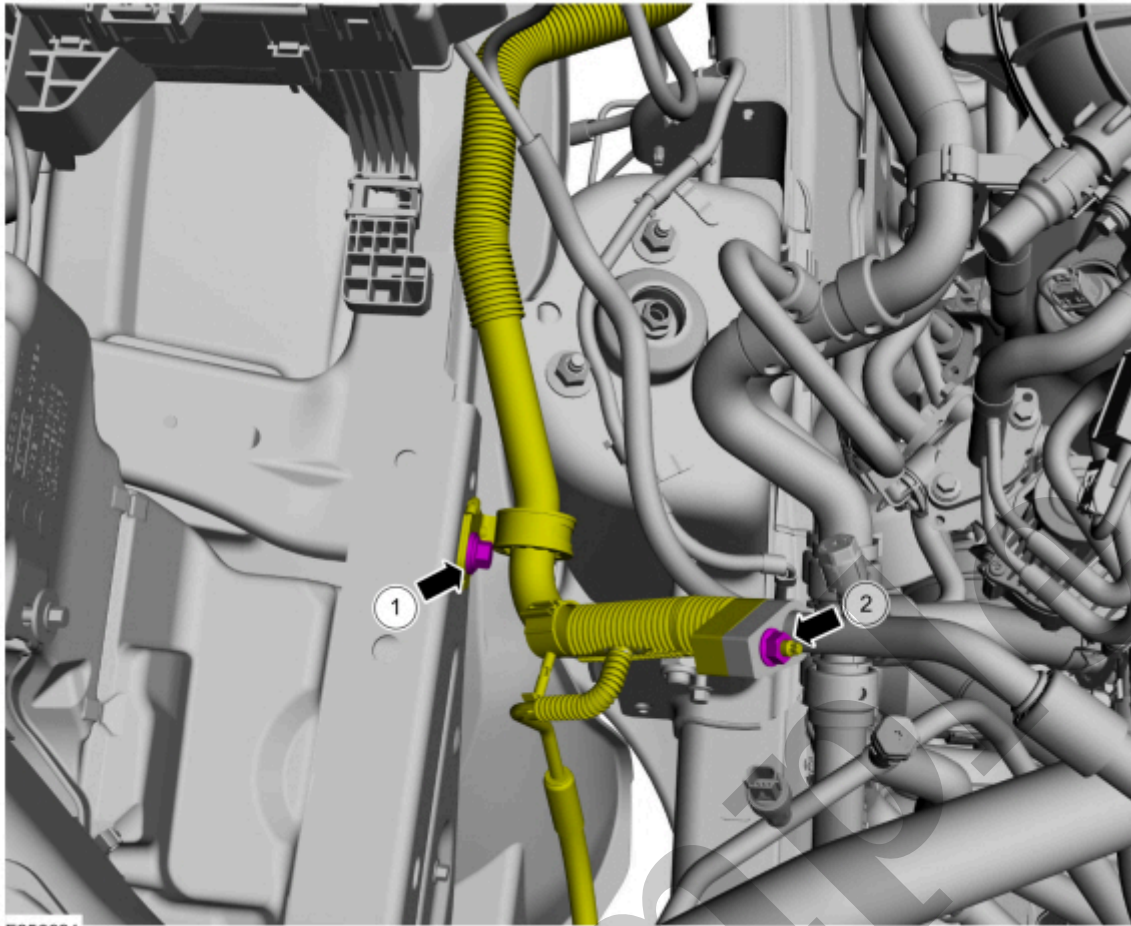
Refer to: [Air Cleaner Outlet Pipe RH](#)(303-12A Intake Air Distribution and Filtering - 2.7L EcoBoost (238kW/324PS), Removal and Installation).

- Remove the RH (right-hand) CAC (charge air cooler) intake pipe.

Refer to: [Charge Air Cooler \(CAC\) Intake Pipe](#)(303-12A Intake Air Distribution and Filtering - 2.7L EcoBoost (238kW/324PS), Removal and Installation).

6. Release the mounting clip and position aside the wiring harness routing bracket.

Use the General Equipment: Flat Headed Screw Driver



E258624

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8. Remove the thermostatic expansion valve manifold and tube assembly nut, disconnect the fitting and remove the thermostatic expansion valve manifold and tube assembly.

- Make sure to cover any open ports to prevent debris from entering the system.

***Torque*** : 80 lb.in (9 Nm)



## Thermostatic Expansion Valve Manifold and Tube Assembly - 3.3L Duratec-V6

<b>412-00 Climate Control System - General Information</b>	<b>2022 F-150</b>
<b>Removal and Installation</b>	<b>Procedure revision date: 10/5/2020</b>

### Thermostatic Expansion Valve Manifold and Tube Assembly - 3.3L Duratec-V6

#### Removal

##### NOTICE

During the removal or installation of components, cap, tape or otherwise appropriately protect all openings and tubes/fittings to prevent the ingress of dirt or other contamination. Remove caps, tape and other protective materials prior to installation.

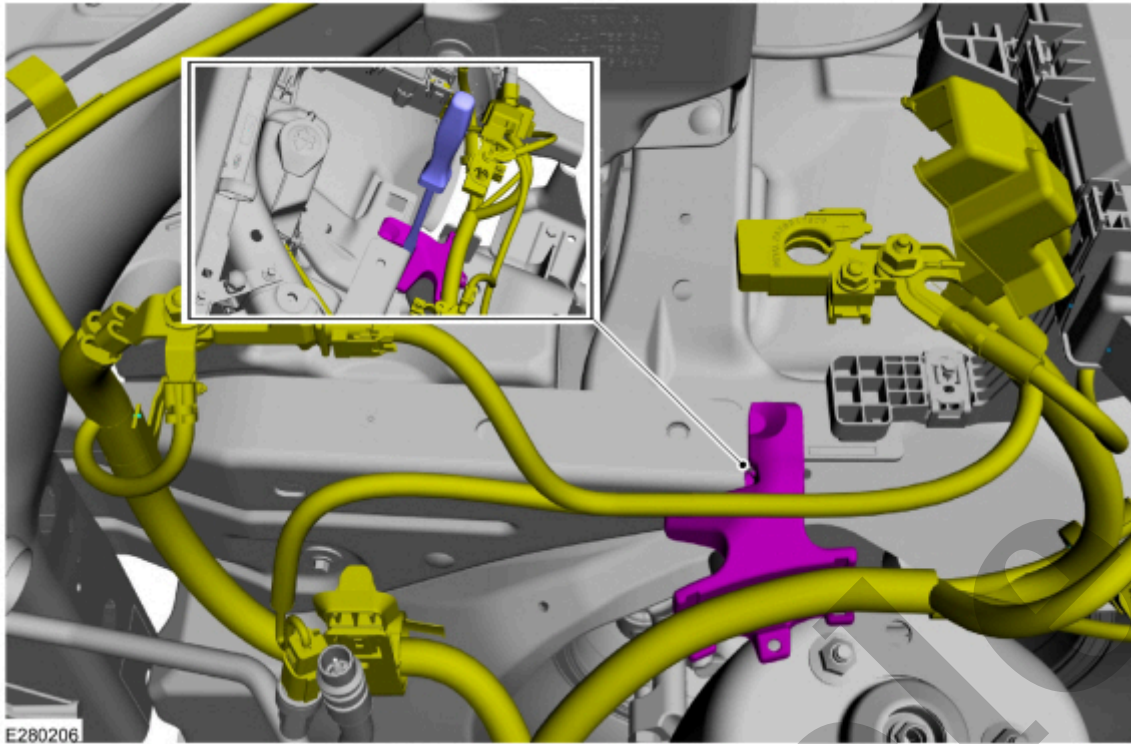
##### NOTE

Removal steps in this procedure may contain installation details.

1. Recover the refrigerant. Refer to the appropriate Recovery procedure in Group 412.
2. Remove the radiator grille.  
Refer to: [Radiator Grille](#)(501-08 Exterior Trim and Ornamentation, Removal and Installation).
3. Remove the thermostatic expansion valve manifold and tube assembly nut and disconnect the fitting.
  - Make sure to cover any open ports to prevent debris from entering the system.

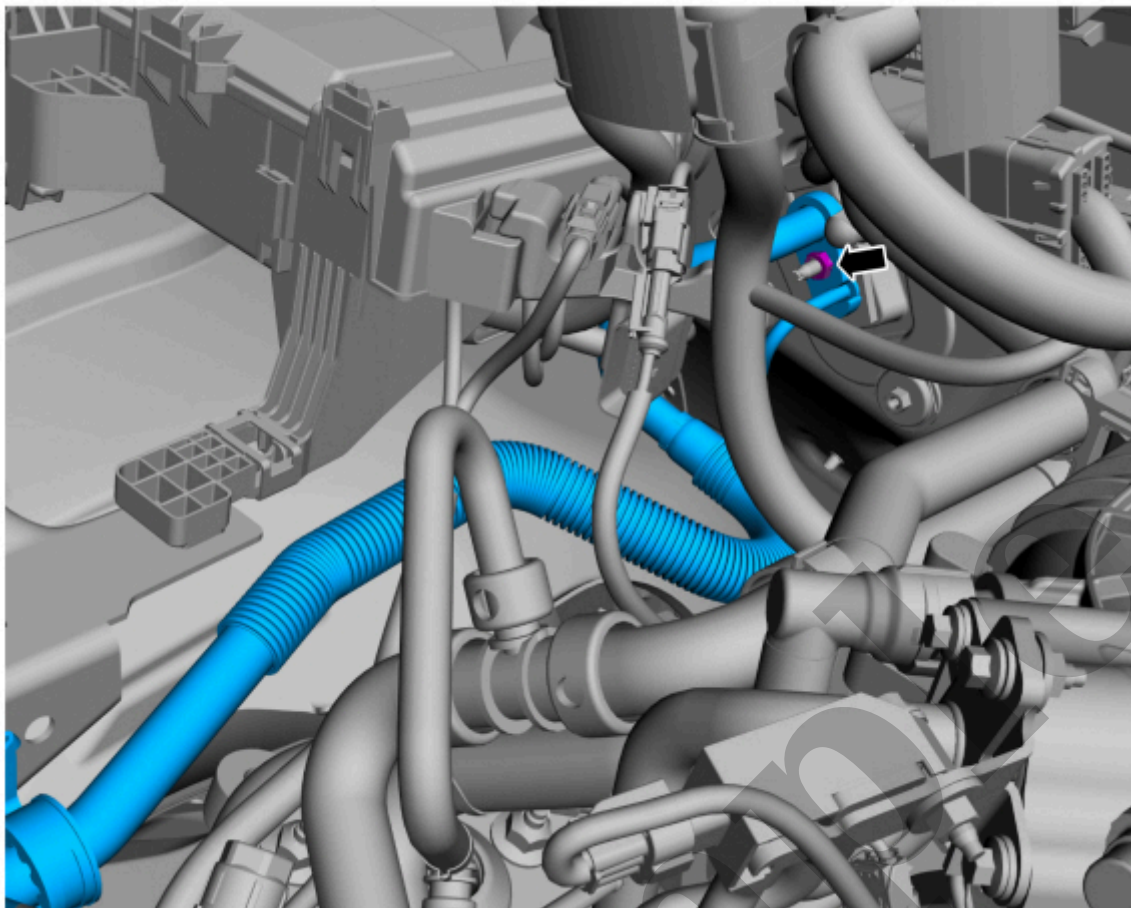
**Torque** : 71 lb.in (8 Nm)





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6. 1. Remove the thermostatic expansion valve manifold tube assembly bracket retainer.  
***Torque*** : 133 lb.in (15 Nm)
2. Remove the A/C (air conditioning) compressor inlet line nut and disconnect the fitting.  
***Torque*** : 133 lb.in (15 Nm)
- Make sure to cover any open ports to prevent debris from entering the system.



E258625

[Click here to learn about symbols, color coding, and icons used in this manual.](#)

## Installation

1. To install, reverse the removal procedure.

### 2. NOTICE

Only use the specified material to lubricate the seals.

Install and lubricate new O-ring seals. Refer to the appropriate Specifications in Group 412.

3. Lubricate the refrigerant system with the correct amount of clean PAG oil. Refer to the appropriate Refrigerant Oil Adding procedure in Group 412.