

## Transmission Oil Cooler Hose, Replacement CHU, CXU, GU, TE, PI, AN, GR

### FSB 491-032 Transmission Oil Cooler Hose, Replacement

(March 2021)

When replacing the transmission oil cooler hose on vehicles build prior to November 13th, 2020, new oil cooler hose lines will be necessary to connect the oil cooler. The new oil cooler hoses increase the sealing capacity.

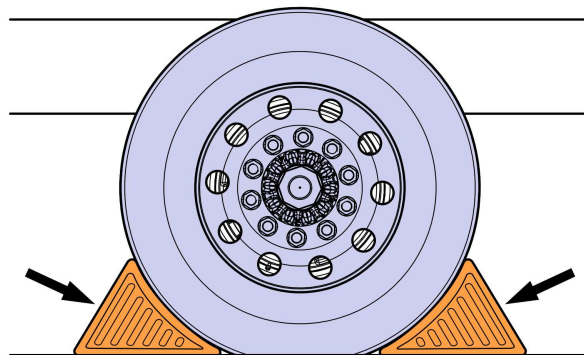
#### Required Parts

Quantity	Part Number	Part Description
1	23790464	Oil hose
1	23790470	Oil hose
1	23902388	Bracket

You must read and understand the precautions and guidelines in Service Information, group 40, "General Safety Practices, Transmission" before performing this procedure. If you are not properly trained and certified in this procedure, ask your supervisor for training before you perform it.

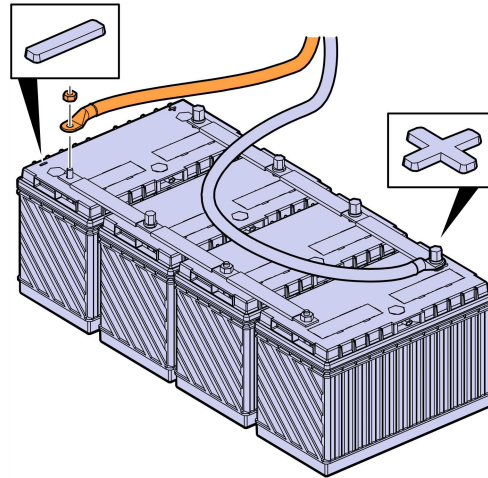
**NOTE:** Information is subject to change without notice. Illustrations are used for reference only and can differ slightly from the actual vehicle being serviced. However, key components addressed in this information are represented as accurately as possible.

- 1 Park the vehicle on a flat and level surface.
- 2 Apply the parking brake.
- 3 Place the transmission in neutral or park.
- 4 Install the wheel chocks.



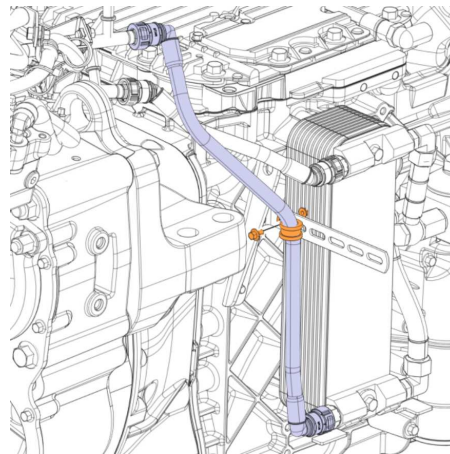
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- 5 Unlatch and remove the battery box cover.
- 6 Disconnect the cable from the battery's negative terminal.



T3164283

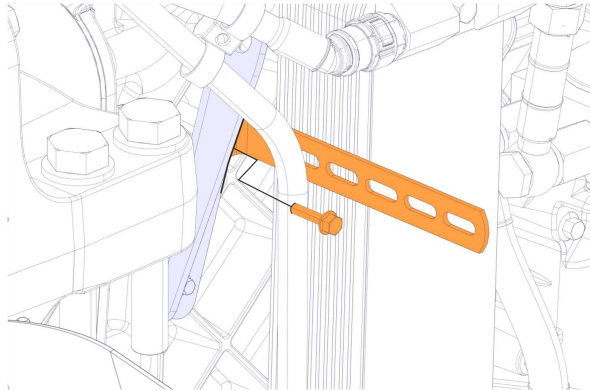
- 7 Raise and support the vehicle.
- 8 Remove the screw and the nut.
- 9 Remove the clamp.



T4164285

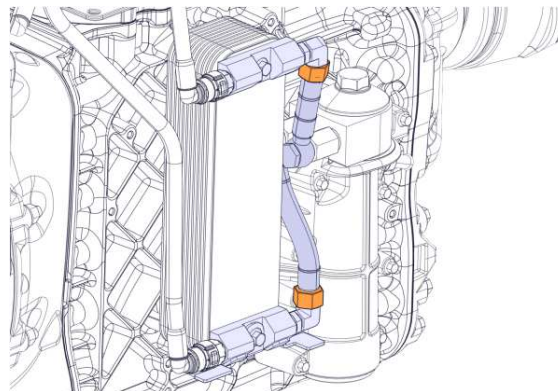
10 Remove the screw.

11 Remove the bracket.



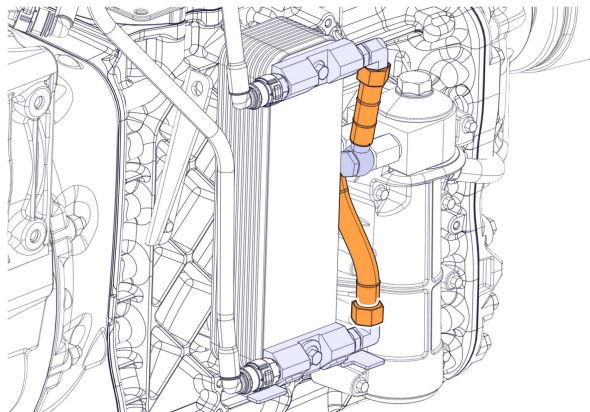
T4164286

12 Loosen the nuts.



T4164287

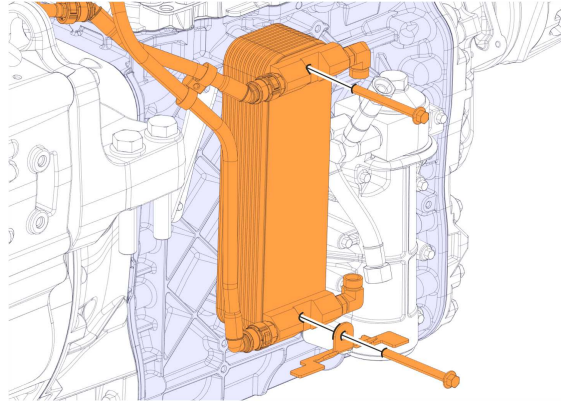
13 Move aside the hoses.



T4164288

14 Remove the screws along with the bracket.

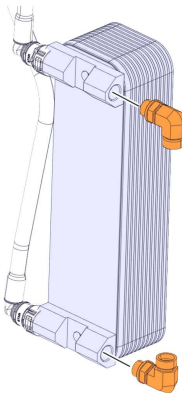
15 Move aside the assembly.



T4164289

16 Remove the fittings.

**Note:** Discard the fittings and seals.

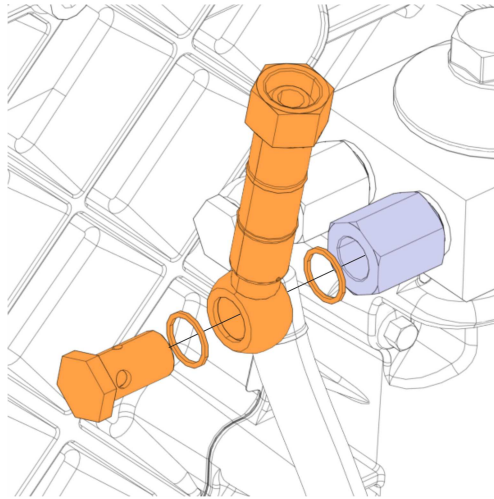


T4164425

17 Remove the hose

**Note:** Discard the hose, fittings and seals.

**Note:** Use a wrench to hold the fitting adapter from turning.

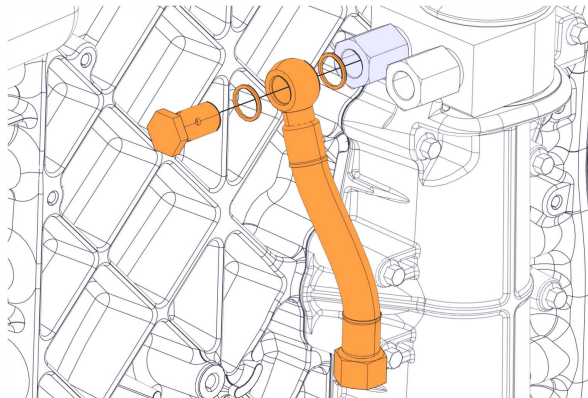


T4164290

18 Remove the hose.

**Note:** Discard the hose, fittings and seals.

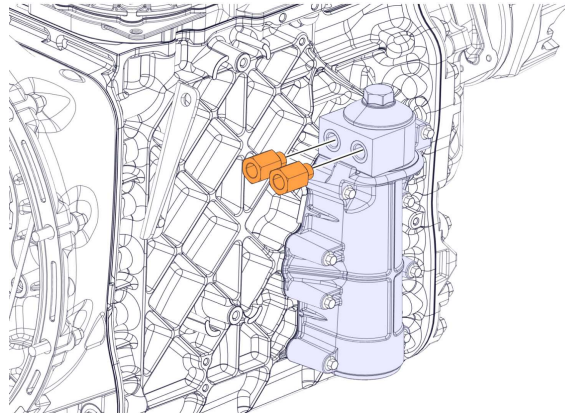
**Note:** Use a wrench to hold the fitting adapter from turning.



T4164291

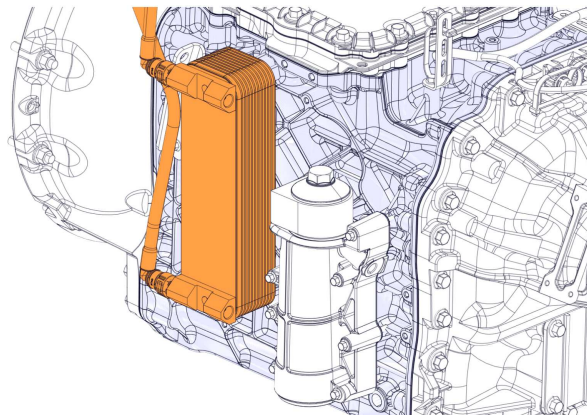
19 Remove the fittings.

**Note:** Discard the fittings and seals.



T4164426

20 Position the assembly.

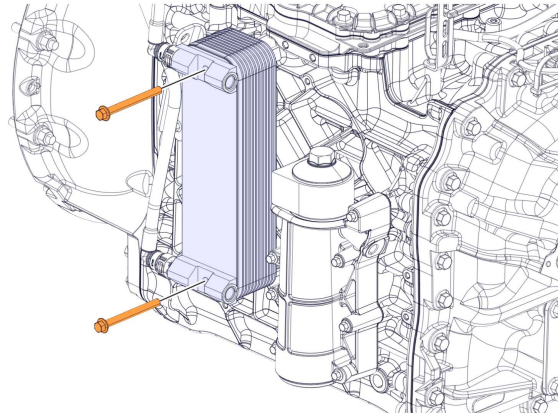


T4164351

21 Install the screws

**Note:** Do not install the bracket.

**Note:** Hand tighten only.



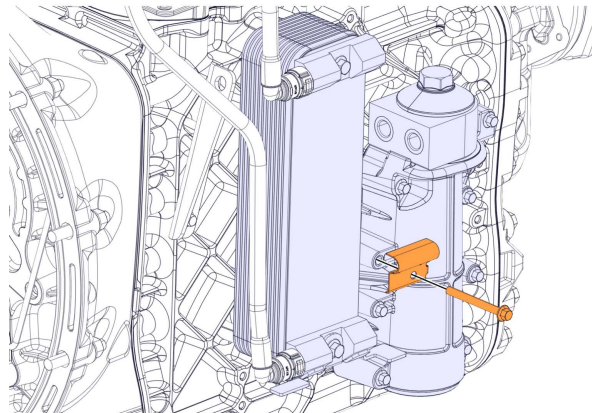
T4164296

22 Remove the screw.

23 Install the bracket.

24 Install the screw.

25 Torque tighten the screw to  $24 \pm 4$  Nm ( $18 \pm 3$  lbf·ft).

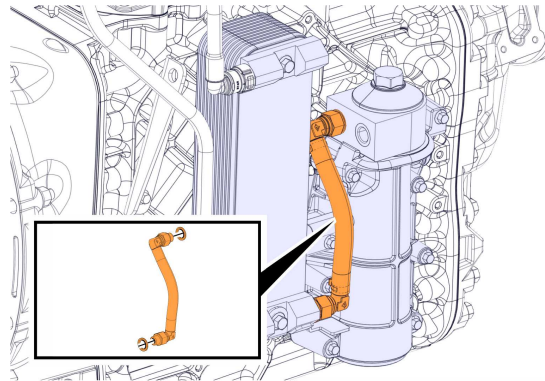


T4164292

26 Install the washers.

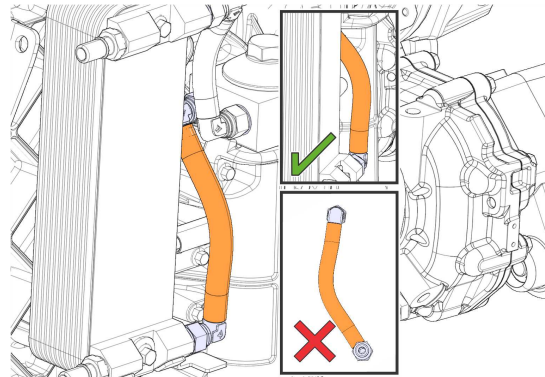
**Note:** Use new parts.

27 Install the hose.



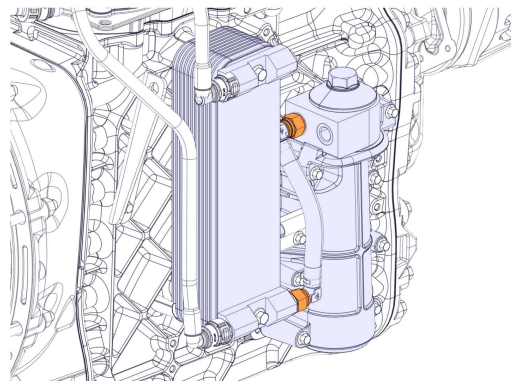
T4171213

**Note:** Check for correct alignment of the hose.



T4171215

28 Torque tighten the hose fittings to  $45 \pm 5$  Nm ( $33 \pm 4$  lbf-ft).



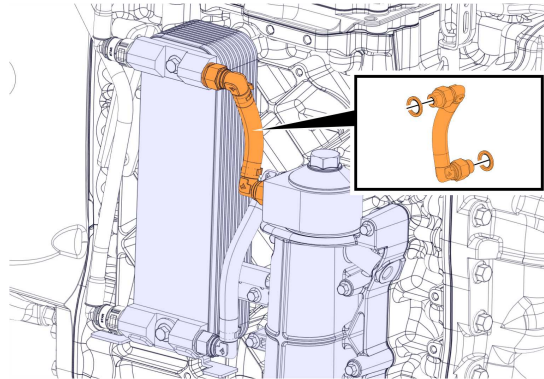
T4164365



29 Install the washers.

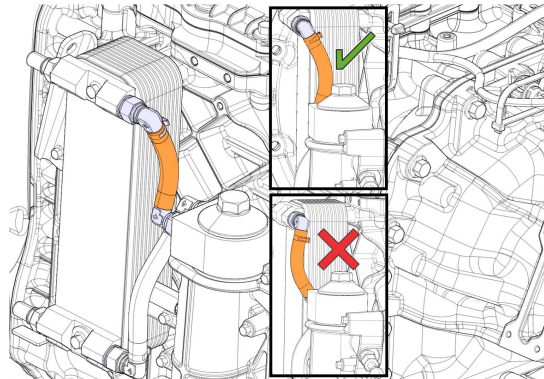
**Note:** Use new parts.

30 Install the hose.



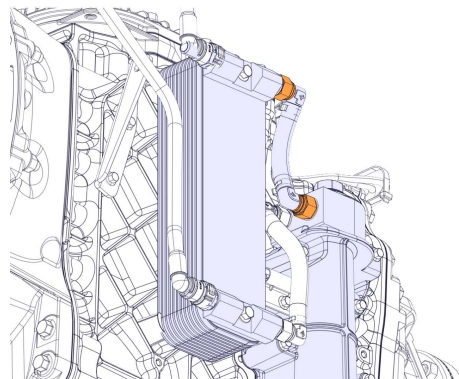
T4171212

**Note:** Check for correct alignment of the hose.



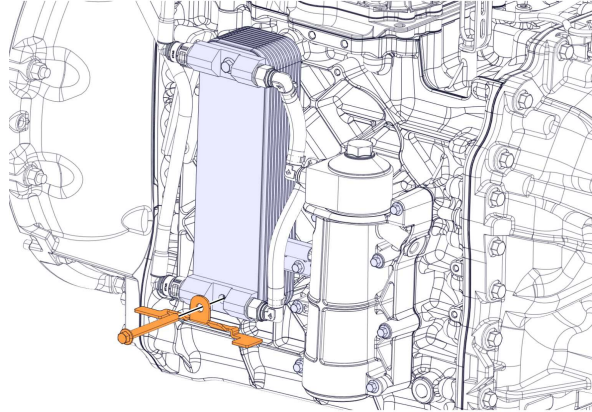
T4171214

31 Torque tighten the hose fittings to  $45 \pm 5$  Nm ( $33 \pm 4$  lbf-ft).



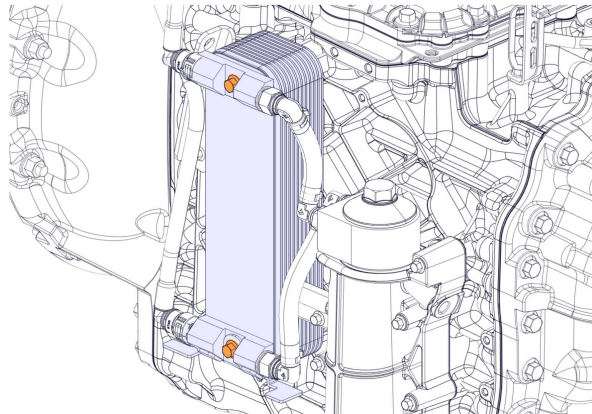
T4164428

32 Remove the bottom screw, then install the bracket along with the screw.



T4164295

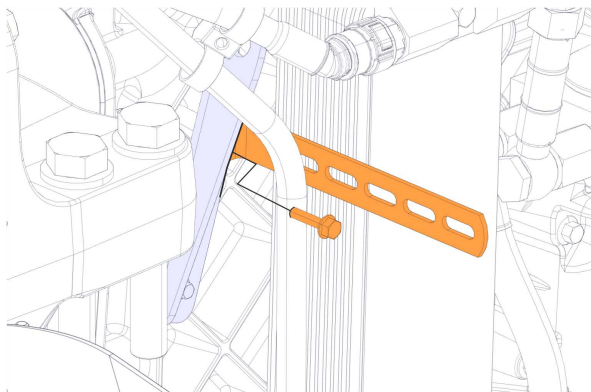
33 Torque tighten the screws to  $50 \pm 5$  Nm ( $37 \pm 4$  lbf.ft).



T4164364

34 Install the bracket.

35 Install the screw.

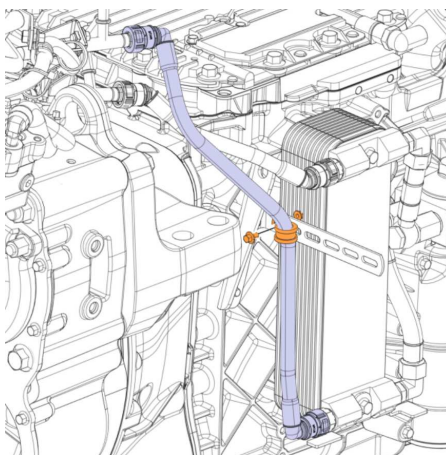


T4164286

36 Install the clamp.

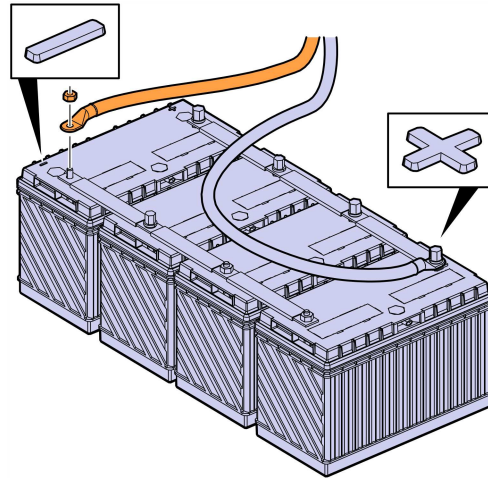
37 Install the screw and the nut.

38 Torque tighten the screw to  $9.9 \pm 1.5$  Nm ( $88 \pm 13$  lbf-in).



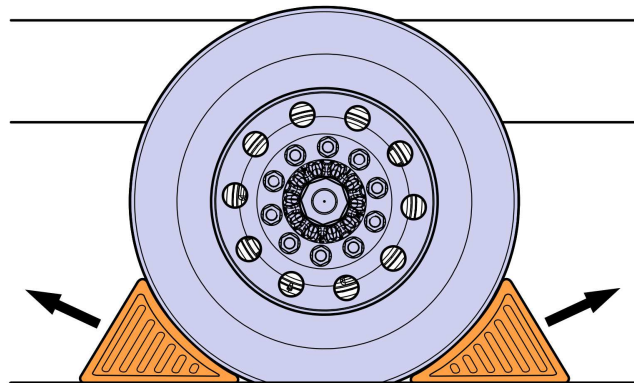
T4164285

- 39 Connect the battery cable to the battery's negative (ground) terminal.
- 40 Tighten the fastener to  $21 \pm 1$  Nm ( $16 \pm 1$  ft-lb).



T3164283

- 41 Position and latch the battery box cover.
- 42 Start the engine and check for leaks.
- 43 Check the transmission oil level. Replenish with the correct fluid as needed.
- 44 Remove the wheel chocks.



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**Reimbursement**

<b>This repair may be eligible for reimbursement if a product failure was experienced within time and mileage limits of the applicable Warranty coverage. Reimbursement is obtained via the normal claim handling process.</b>	<b>UCHP Reimbursement</b>
<b>Claim Type (used only when uploading from the Dealer Bus. Sys.)</b>	01
<b>Labor Code</b>	
Primary Labor Code	4912-03-09-02 1.5 hrs
<b>Causal Part</b>	23701845, 23701846

**Note:** This only covers transmission oil cooler radiator replacements that are under warranty.

MACK Trucks North America reserves the right to make any changes in design or to make additions to or upon its products without incurring any obligations to install the same on vehicles previously built.