

December 10, 2024

Version 3

Product Update: 2022–24 Civic EPS Gearbox Inspection (Service Parts)Supersedes 23-089, dated December 8, 2023, to revise the information highlighted in **yellow**.**AFFECTED VEHICLES**

Year	Model	Trim Level	VIN Range
2022–24	Civic	LX, EX, EX-T	Check iN VIN status for eligibility.

REVISION SUMMARY

- Under PARTS INFORMATION, a part number was updated.
- Under WARRANTY INFORMATION, a note was added.

BACKGROUND

Due to a manufacturing error, certain service part electric power steering (EPS) gearbox assemblies were not made to proper specification which may affect the rack stroke. An incorrect rack stroke may cause changes in driving dynamics.

CUSTOMER NOTIFICATION

Owners of affected vehicles will be sent a notification of this campaign.

Do an iN VIN status inquiry to verify eligibility.

Some vehicles affected by this campaign may be in your new or used vehicle inventory. Repair these vehicles before they are sold.

CORRECTIVE ACTION

Inspect the EPS gearbox part number label and, if necessary, replace the EPS gearbox.

CUSTOMER INFORMATION: The information in this bulletin is intended for use only by skilled technicians who have the proper tools, equipment, and training to correctly and safely maintain your vehicle. These procedures should not be attempted by “do-it-yourselfers,” and you should not assume this bulletin applies to your vehicle, or that your vehicle has the condition described. To determine whether this information applies, contact an authorized Honda automobile dealer.

PARTS INFORMATION

Part Name	Part Number	Quantity
Gearbox	53640-T21-316	1
Flange Bolt (12X75)	90161-SX8-T00	4
Washer Bolt (14X85)	90179-T20-A01	4
Flange Bolt (12X30)	90174-T20-A01	2
Washer Bolt (14X45)	90163-TGH-A01	2
Washer Bolt (14X85)	90130-T20-A00	1
Flange Bolt (14X35)	90181-TBA-A00	2
Flange Bolt (14X80)	90108-T20-A00	3
Split Pin (3.0X22)	94201-30220	2
Washer Bolt (10X25)	90159-TBA-A00	3
Self-Lock Nut (12mm)	90215-SB0-003	6
Flange Nut (10mm)	90002-S10-000	2

TOOL INFORMATION

Tool Name	Part Number	Quantity
Subframe Adapter	VSB02C000016	1
Ball Joint Thread Protector (12mm)	07AAF-SDAA100	1
Ball Joint Remover (28mm)	07MAC-SL00202	1
Subframe Alignment Pin	070AG-SJAA10S	1

WARRANTY CLAIM INFORMATION

NOTE:

- When performing service bulletin 23-089 using the **53640-T21-316** parts, this will satisfy the repair for service bulletin 24-119. **To close the status of 24-119**, submit a Campaign Status Change Request Form along with a copy of the repair order to campaign_change_request@ahm.honda.com.
- Due to the number of possibly affected Service Parts, all gearbox/racks replaced are being called in for inspection. If deemed as an inappropriate replacement, the claim may be subject to debit.

REQUIRED:

- Attach the photo of the EPS gearbox label to the warranty claim form. Required photos must be included when submitting your claim, or the claim may be subject to debit. The photos must be clear; retake any unclear photos before submitting.



EPS SERIAL
NUMBER

- Input the EPS serial number into the Test Code field in the warranty claim form when the claim is being submitted.

Repair Information				<input type="checkbox"/> View Flat Rate Labor Time	
Defect Code (Exclude Dash)* 03214		Test Code WA23900622			
Item	Labor Operation No.*	Labor Description	Time*		
1	5131C0	STEERING GEARBOX, ELECTRIC POWER STEERING - REPLACE	1.9	Delete	
2				Delete	
3				Delete	
Total Time			1.9	More >	
M.I.L. On <input type="checkbox"/> Diagnostic Trouble Codes					

Operation Number	Description	Flat Rate Time	Defect Code	Symptom Code	Template ID	Failed Part Number
5135D9	Inspect the parts label (includes photos)	0.3 hr	6GT00	DG400	A23089A	53640-T21-306

Operation Number	Description	Flat Rate Time	Defect Code	Symptom Code	Template ID	Failed Part Number
5131M3	Replace the EPS gearbox (includes inspection, VSA relearn, and alignment).	2.0 hr	6GT00	DG400	A23089B	53640-T21-306

INSPECTION PROCEDURE

1. Open the hood and wait for the engine to cool down.
2. Locate the parts label on the EPX gearbox.
3. Inspect the label on the EPS gearbox and check the ID and part number on the label.
 - If the ID and part number is WA with P/N 53640-T21-3050-M1 or WB with P/N 53640-T21-3060-M1, **take a picture of the label and attach it to the warranty claim**. Then, go to the **REPAIR PROCEDURE**.



- If the EPS has any other ID or part number, no EPS gearbox replacement is needed. Take a picture of the label and attach it to the warranty claim, no further action is needed.

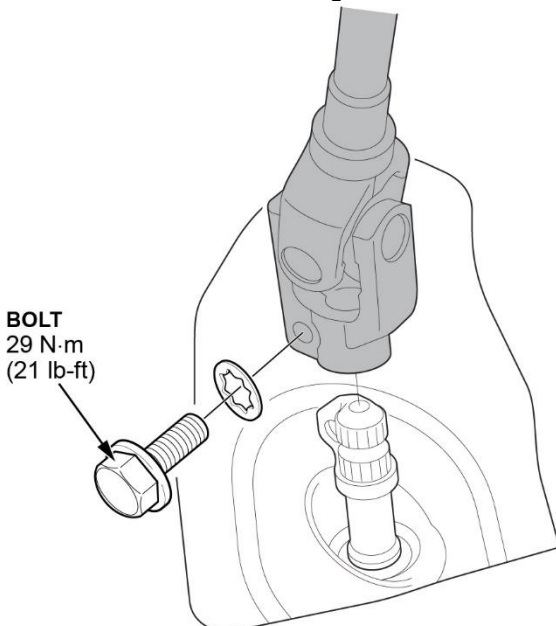
REPAIR PROCEDURE

Refer to Service Information for a more in-depth power steering gearbox removal repair procedure.

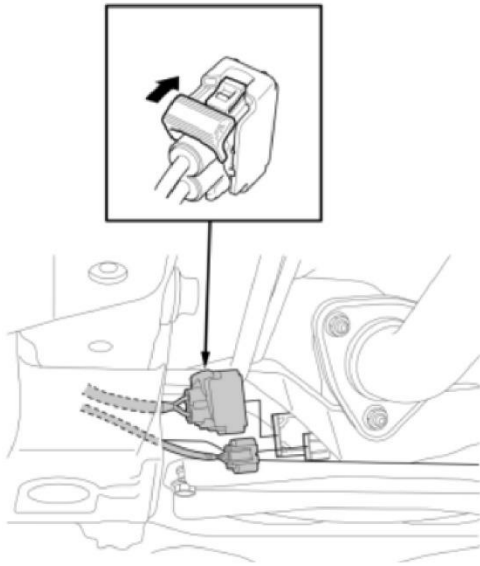
1. Disconnect the 12-volt battery terminals.
2. Disconnect the steering joint.

NOTE:

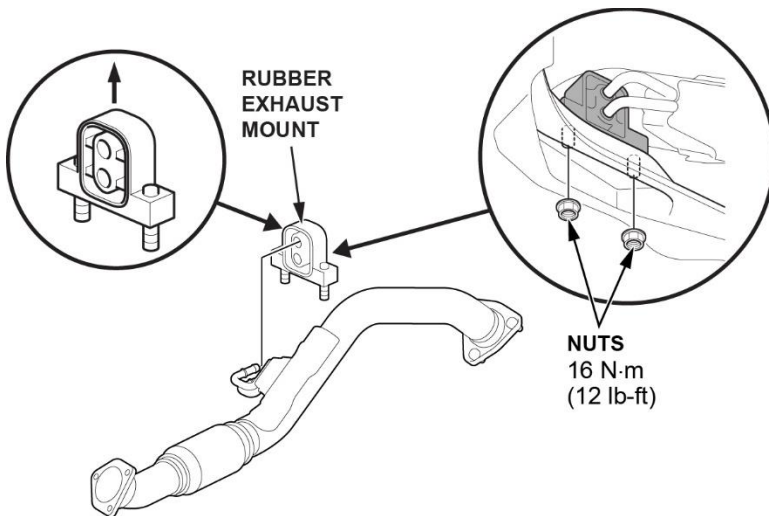
- Set the steering wheel straight ahead before disconnecting the shaft.
- **Do not turn** the steering wheel while disconnecting the steering joint.



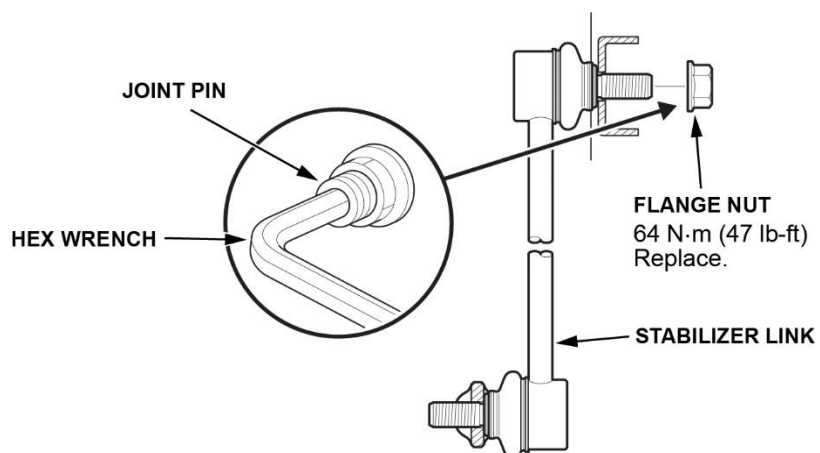
3. Raise the vehicle to a comfortable working height.
NOTE: Keep the vehicle elevated for the remainder of the procedure.
4. Remove the front wheels **108 N·m (80 lb-ft)**.
5. Remove the engine undercover
6. Disconnect the EPS harness connectors.



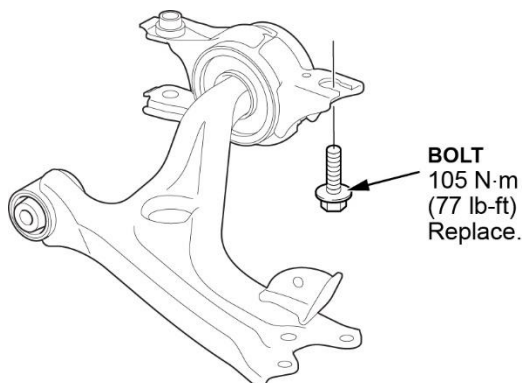
7. Remove the rubber exhaust mount.



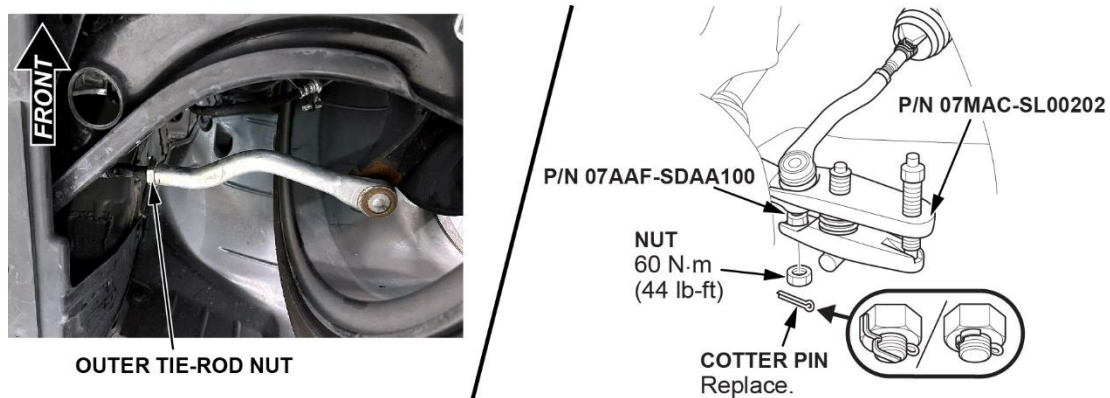
8. Disconnect the stabilizer links upper mounting locations (both sides).



9. Remove the front lower assembly bolt (both sides).

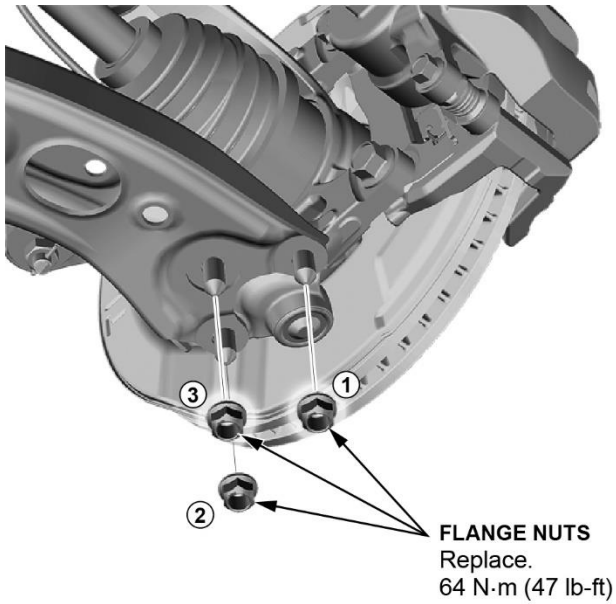


10. Loosen the outer tie-rod end nuts and disconnect the tie-rod end ball joints (both sides).

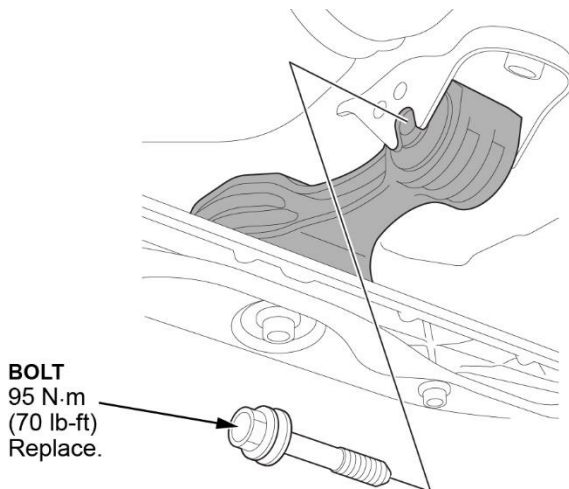


11. Disconnect the front lower arms.

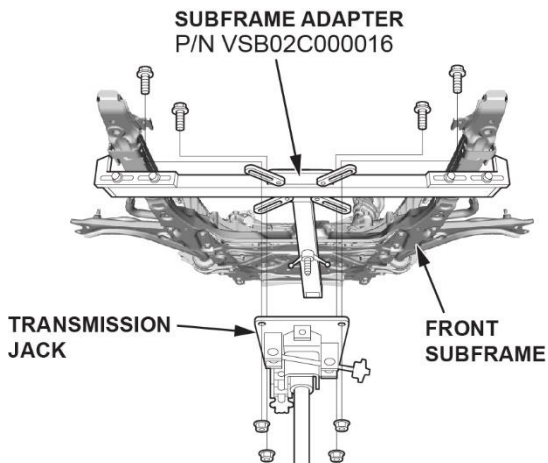
NOTE: During reassembly, loosely install the new flange nuts, then tighten them to the specified torque in the numbered sequence shown.



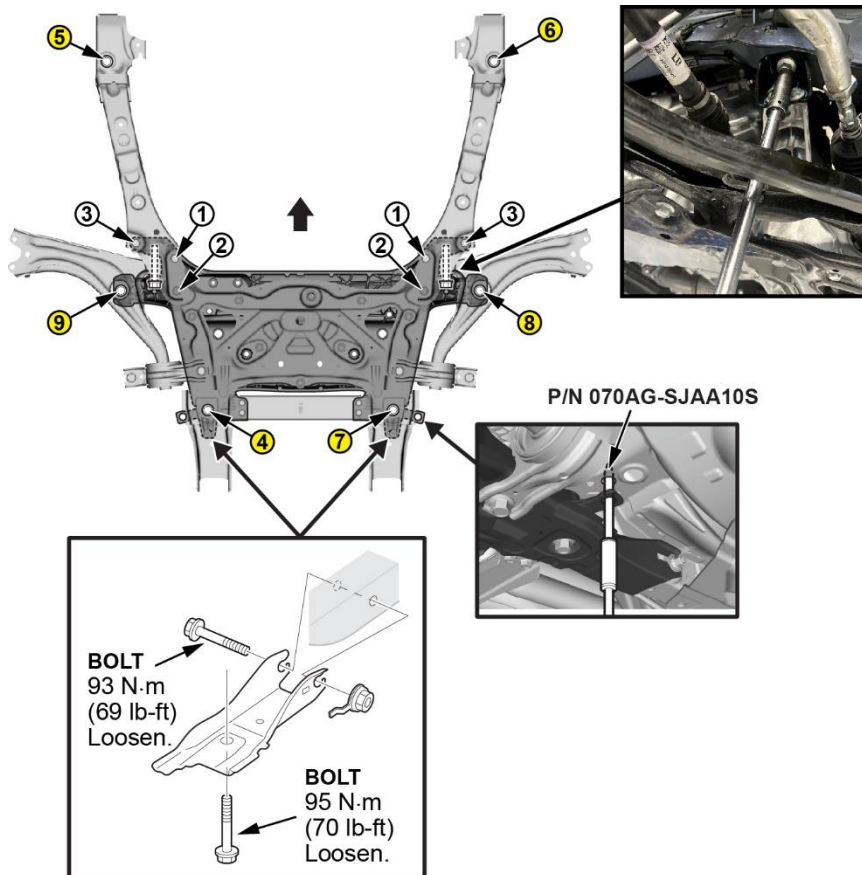
12. Remove the engine torque rod front bolt.



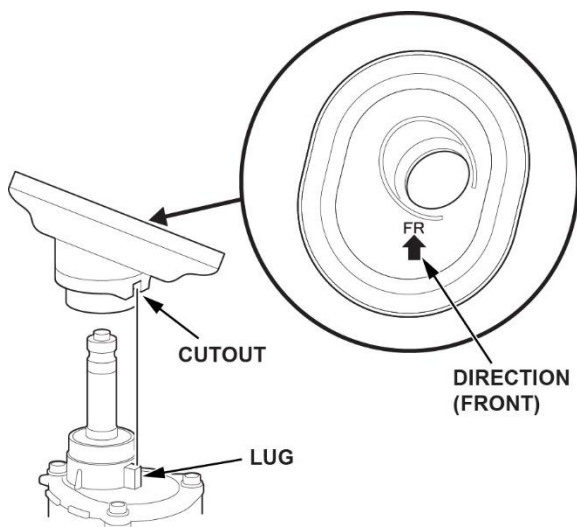
13. Attach the subframe adapter to the front subframe.



14. Raise a transmission jack and line up the slots in the subframe adapter arms with the bolt holes on the transmission jack base, then securely attach the four bolts. Then, remove the bolts highlighted in yellow only.

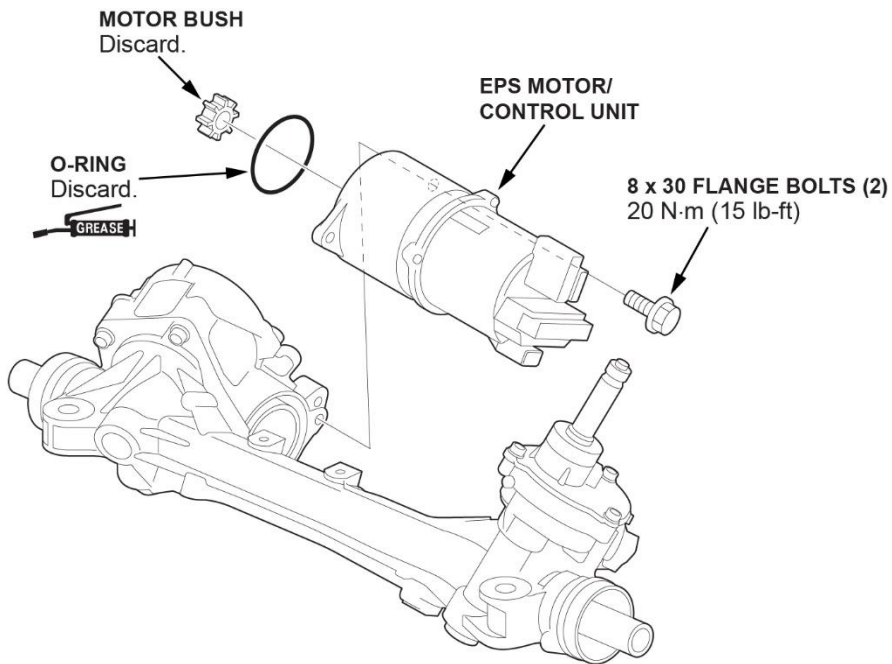


15. Remove the front subframe.
16. Transfer the tie-rod ends to the replacement gearbox.
17. Transfer the steering shaft boot to the replacement gearbox.



18. Remove the steering gearbox from the subframe.

19. Separate the EOS motor/control unit from the removed gearbox and retain for installation on new gearbox.



20. Install the new O-ring (the O-ring is kitted with the new gearbox) to the EPS motor/control unit.

NOTE:

- Apply steering grease or equivalent to the O-ring.
- Discard the motor bush.

21. Install the EPS motor/control unit on the replacement rack with the barcode facing up, but do not install the mounting bolts.

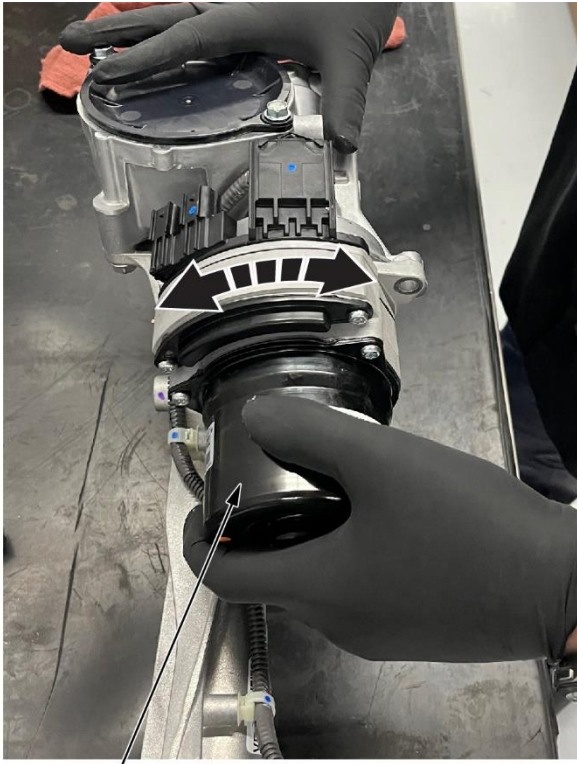


EPS MOTOR CONTROL UNIT
Turn unit two or three times to the right and left (about 45 degrees).



BARCODE
Install with barcode facing up.

22. To seat the EPS motor/control unit turn it **two or three times** to both the **left and right** in a **45° arc**, as shown below.



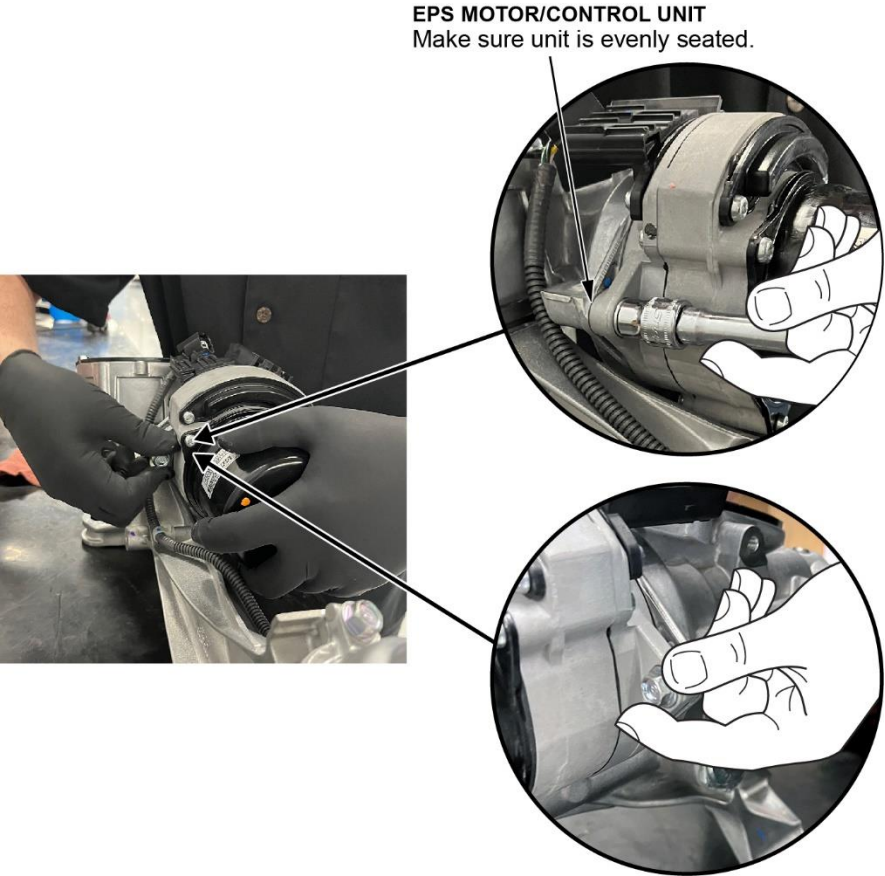
EPS MOTOR CONTROL UNIT

Turn unit two or three times to the right and left (about 45 degrees).

23. Loosely install the EPS motor/control unit mounting bolts by hand, but do not fully torque them yet.

NOTE:

- To prevent damaging the motor and/or gearbox, **DO NOT** use power tools to install or tighten the bolts.
- Make sure the EPS motor/control unit is evenly seated on the P/S gearbox.



24. Torque the EPS motor/control unit mounting bolts to **20 N·m (15 lb·ft)**.

25. Install the EPS gearbox to the subframe and torque to specification as shown.

BOLTS (3)
9.5 N·m
(7.0 lb·ft)

BOLT
92 N·m
(68 lb·ft)
Replace.

BOLT
44 N·m
(32 lb·ft)
Replace.

BOLTS (2)
92 N·m
(68 lb·ft)
Replace.

BOLTS
44 N·m
(32 lb·ft)
Replace.

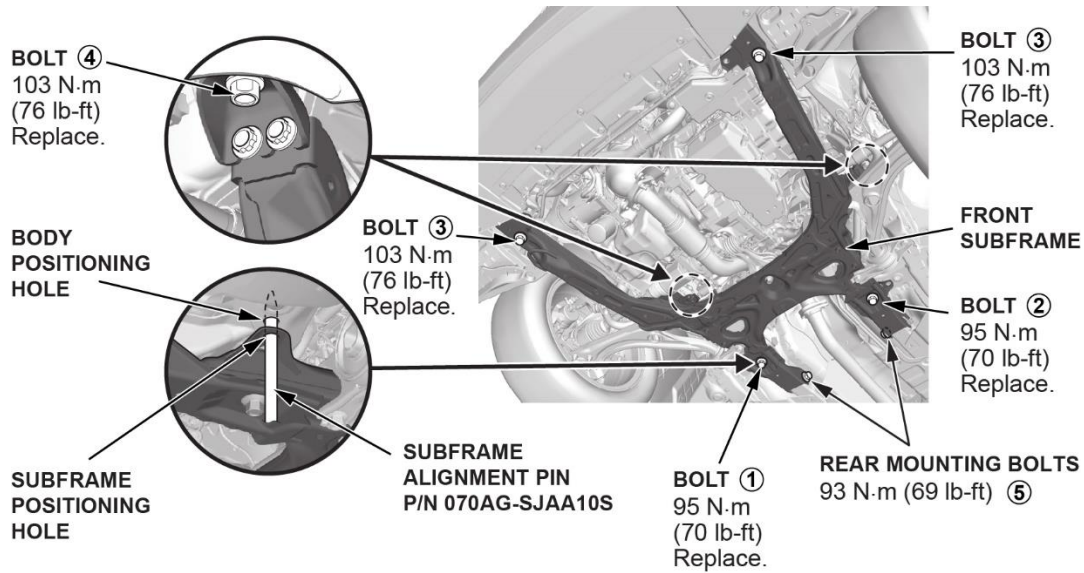
Installation Directions

Position	Direction
a	Front

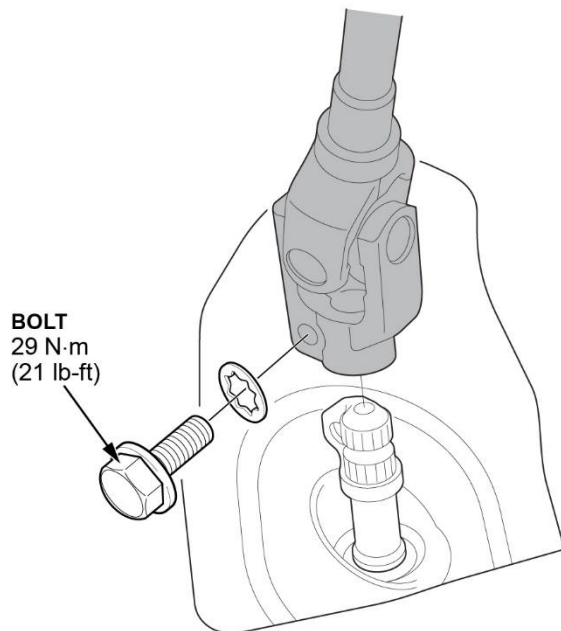
Tightening Procedure

Step	Operation	Object	Specification
1	Temporarily Tighten	All Bolts	—
2	Tighten	All Bolts	①→②→③→④→⑤→⑥

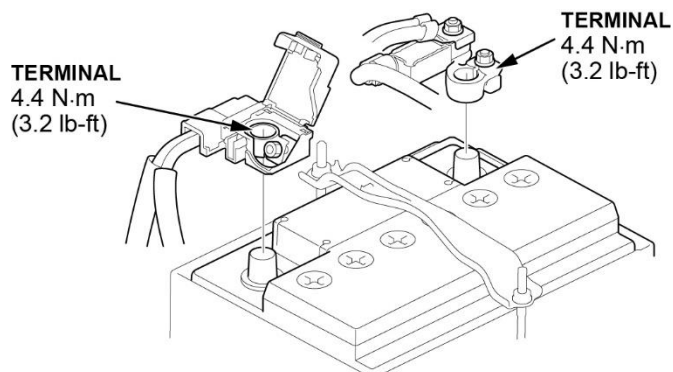
26. Raise the transmission jack with the subframe and use the alignment pins to position the subframe. Loosely install the subframe mounting bolts and the subframe rear stay mounting bolts. Torque the front subframe and rear stay bolts to specification.



27. Install the pinion shaft to the steering joint and torque the bolt to specification.



28. Connect the 12-volt battery.



29. Install the remaining parts in the reverse order of removal.
30. With the front wheels set straight ahead, make sure the steering wheel is centered.
31. Make sure the turning revolutions from center to full lock (left and right) are equal.
32. With the tires raised, check for noise and abnormality by turning the steering wheel **fully** to the **right and left** several times.
33. Confirm the EPS provides power assist.
34. Check that the EPS indicator does not come on.
35. Do a wheel alignment.
36. Do the VSA Sensor Neutral Position Memorization.
 - Park the vehicle on a flat and level surface.
 - Connect i-HDS to the DLC.
 - Turn the vehicle to the ON mode, but **do not** start the engine.
 - Set the steering wheel in the straight ahead position.
 - Select the **ADJUSTMENT** from the **ABS/TCS/VSA** menu with the i-HDS, then select **ALL SENSOR**, and follow the screen prompts.