

FRONT DIFFERENTIAL CARRIER ASSEMBLY > INSTALLATION

for Preparation [Click here](#)

1. INSTALL FRONT DIFFERENTIAL CARRIER ASSEMBLY

a. Install the front No. 3 differential support with the 2 bolts.

Torque:

108 N*m{ 1100 kgf*cm , 80 ft.*lbf }

b. Install the front No. 2 differential support with the 2 bolts.

Torque:

160 N*m{ 1632 kgf*cm , 118 ft.*lbf }

c. Install the front No. 1 differential support with the 3 bolts.

Torque:

186 N*m{ 1899 kgf*cm , 137 ft.*lbf }

d. Support the front differential with a jack.

e. Install the 2 front mounting bolts and 2 nuts.

Torque:

137 N*m{ 1400 kgf*cm , 101 ft.*lbf }

f. Connect the actuator hose and connector.

g. Install the No. 1 front differential mounting nut.

Torque:

87 N*m{ 889 kgf*cm , 64 ft.*lbf }

h. Install the front differential breather tube bracket with the bolt.

Torque:

13 N*m{ 133 kgf*cm , 10 ft.*lbf }

i. Lower the jack.

2. INSTALL FRONT PROPELLER SHAFT ASSEMBLY

a. Install the front propeller shaft assembly ([Click here](#)).

3. INSTALL FRONT DRIVE SHAFT ASSEMBLY

a. Install the front drive shaft assembly ([Click here](#)).

4. INSTALL FRONT LOWER NO. 1 SUSPENSION ARM SUB-ASSEMBLY LH

- a. Install the front lower No. 1 suspension arm sub-assembly ([Click here](#)).

5. INSTALL FRONT LOWER NO. 1 SUSPENSION ARM SUB-ASSEMBLY RH

HINT:

Use the same procedure described for the LH side.

6. CONNECT TIE ROD END SUB-ASSEMBLY LH

- a. Connect the tie rod end sub-assembly LH ([Click here](#)).

7. CONNECT TIE ROD END SUB-ASSEMBLY RH

- a. Connect the tie rod end sub-assembly RH ([Click here](#)).

8. INSTALL FRONT SPEED SENSOR

- a. Install the front speed sensor ([Click here](#)).

9. INSTALL FRONT WHEEL

Torque:

112 N*m { 1137 kgf*cm , 82 ft.*lbf }

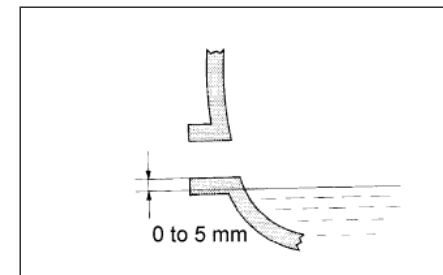
10. ADD DIFFERENTIAL OIL

- a. Remove the differential filler plug and gasket.

- b. Pour oil into the differential carrier assembly so that the oil level is within 0 to 5 mm (0 to 0.197 in.) of the bottom of the filler plug opening.

NOTICE:

Excessively large or small quantities of oil may cause problems.



Front Differential Capacity:

Oil Type and Viscosity	Specified Condition
Toyota Genuine Differential gear oil LT SAE 75W-85 API GL-5 or equivalent	1.35 to 1.45 liters (1.43 to 1.53 US qts, 1.18 to 1.27 Imp. qts.)

Rear Differential Capacity:

Oil Type and Viscosity	Specified Condition
Toyota Genuine Differential gear oil LT SAE 75W-85 API GL-5 or equivalent	2.65 to 2.75 liters (2.80 to 2.91 US qts, 2.33 to 2.42 Imp. qts.)

- c. Install a new gasket and the differential filler plug.

Torque:

Front differential carrier:

39 N*m { 400 kgf*cm , 29 ft.*lbf }

Rear differential carrier:

49 N*m { 500 kgf*cm , 36 ft.*lbf }

- d. Drive the vehicle and check the oil level again.
If necessary, add differential oil.

11. INSPECT DIFFERENTIAL OIL LEVEL

- a. Stop the vehicle on a level surface.
- b. Remove the differential filler plug and gasket.
- c. Check that the oil level is within 0 to 5 mm (0 to 0.197 in.) of the bottom of the filler plug opening.

NOTICE:

Excessively large or small quantities of oil may cause problems.

If the oil level is low, add differential oil to adjust the oil level.

If the oil level is still low, check for oil leakage. If leakage is found, repair or replace the part necessary to stop the leakage.

- d. Install a new gasket and differential filler plug.

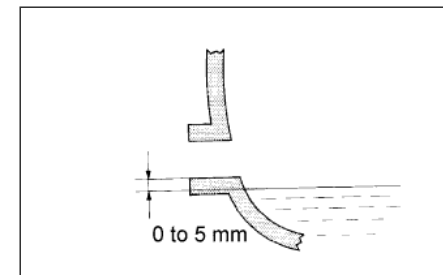
Torque:

Front differential carrier:

39 N*m{ 400 kgf*cm , 29 ft.*lbf }

Rear differential carrier:

49 N*m{ 500 kgf*cm , 36 ft.*lbf }



12. CHECK FOR DIFFERENTIAL OIL LEAKAGE

13. INSTALL REAR ENGINE UNDER COVER ASSEMBLY

- a. Install the rear engine under cover with the 4 bolts.

Torque:

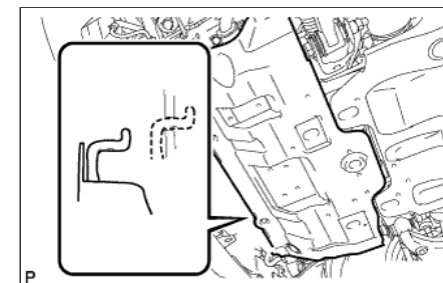
29 N*m{ 296 kgf*cm , 21 ft.*lbf }

14. INSTALL NO. 1 ENGINE UNDER COVER

- a. Hook the No. 1 engine under cover to the vehicle body as shown in the illustration.
- b. Install the 4 bolts.

Torque:

29 N*m{ 296 kgf*cm , 21 ft.*lbf }



15. CONNECT CABLE TO NEGATIVE BATTERY TERMINAL

NOTICE:

When disconnecting the cable, some systems need to be initialized after the cable is reconnected ([Click here](#)).

16. CHECK SPEED SENSOR SIGNAL

- a. Check the speed sensor signal ([Click here](#)).

17. ADJUST FRONT WHEEL ALIGNMENT

- a. Adjust the front wheel alignment ([Click here](#)).