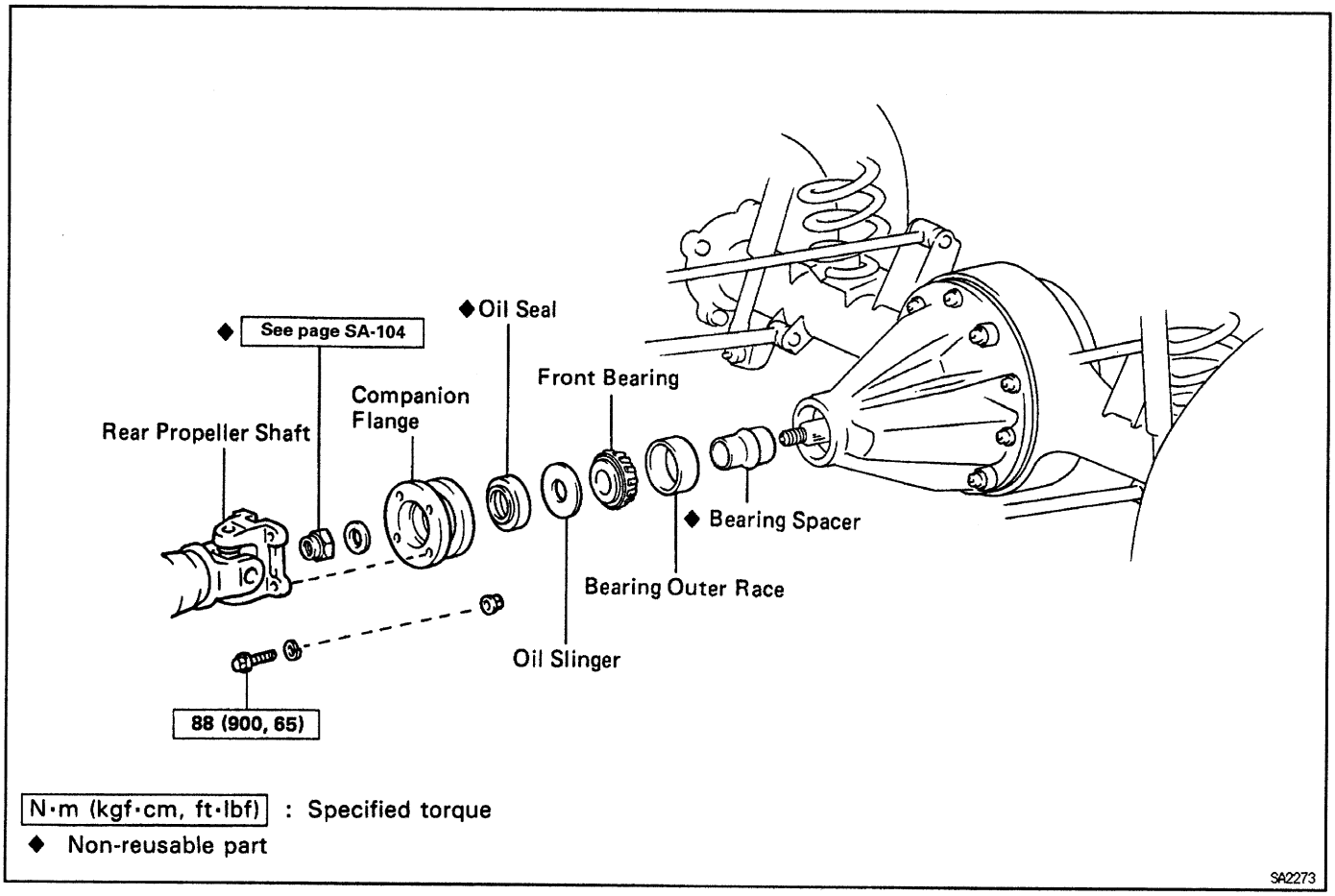
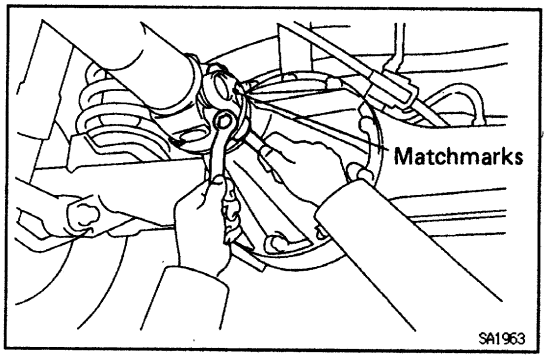
ON–VEHICLE REPAIR

SA180–01

COMPONENTS





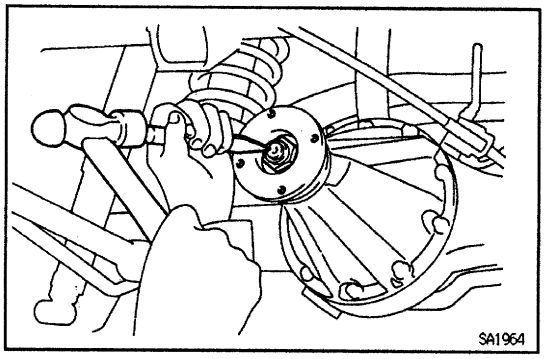
Z0020420

FRONT OIL SEAL REPLACEMENT

1. DISCONNECT REAR PROPELLER SHAFT

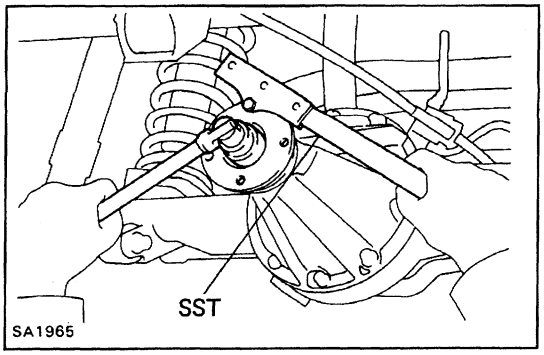
(a) Place matchmarks on the flanges.

(b) Remove the 4 bolts and nuts and disconnect the rear propeller shaft.

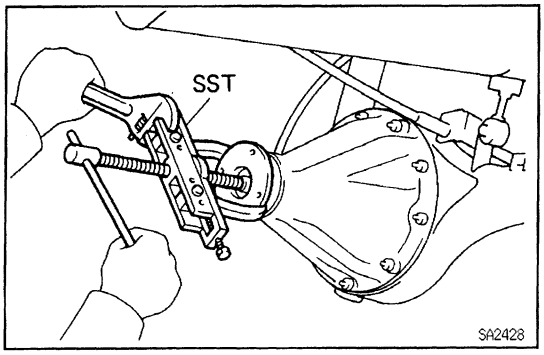


2. REMOVE CONPANfON FLANGE

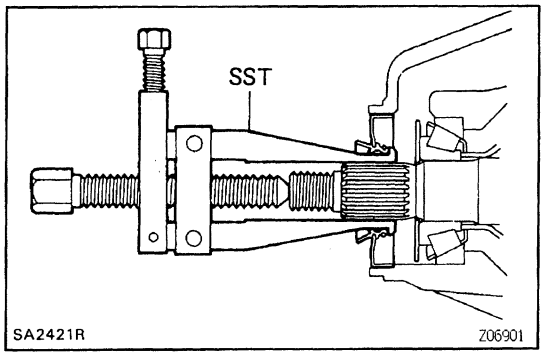
(a) Using a chisel and hammer, loosen the staked part of the nut.



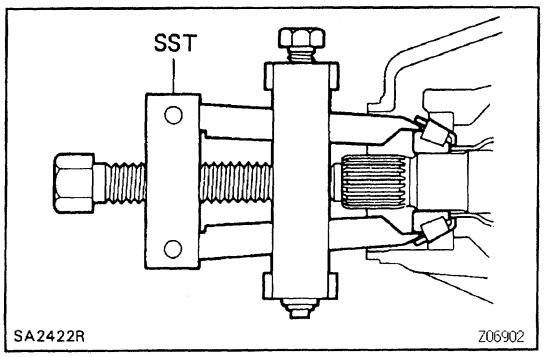
(b) Using SST to hold the flange, remove the nut and washer.
SST 09330–00021



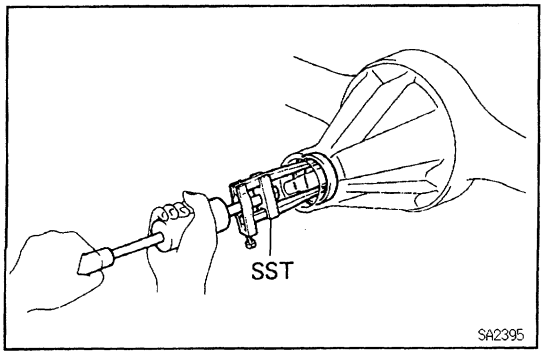
(c) Using SST, remove the companion flange.
SST 09950–20017



3. REMOVE OIL SEAL AND OIL SLINGER
(a) Using SST, remove the oil seal.
SST 09308–10010
(b) Remove the oil slinger.



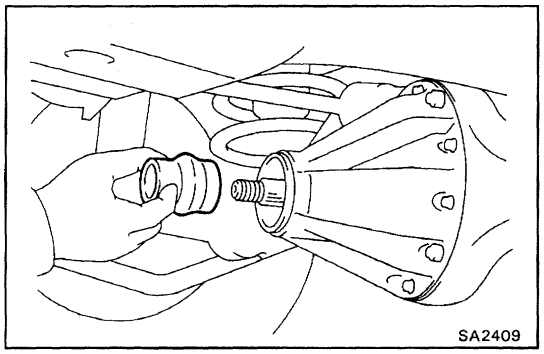
4. REMOVE FRONT BEARING
Using SST, remove the front bearing from the drive pinion.
SST 09556–22010



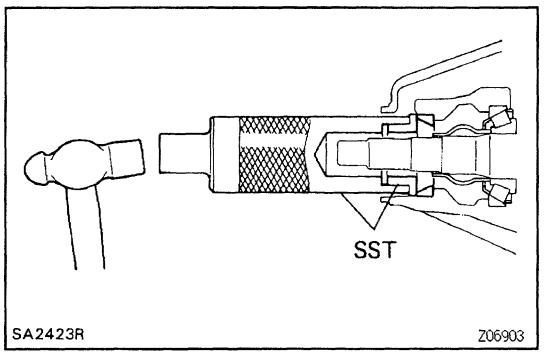
5. REMOVE BEARING OUTER RACE
Using SST, remove the bearing outer race.
SST 09308 – 00010

NOTICE: Do not scratch the taper surface of the outer race.

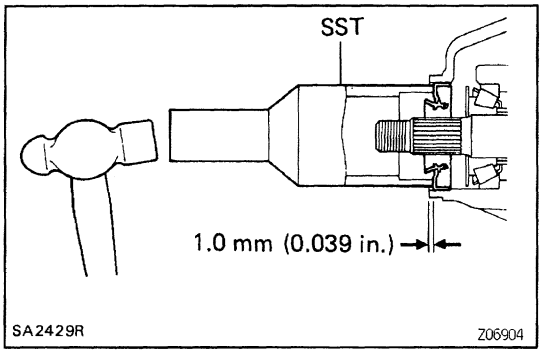
6. REMOVE BEARING SPACER



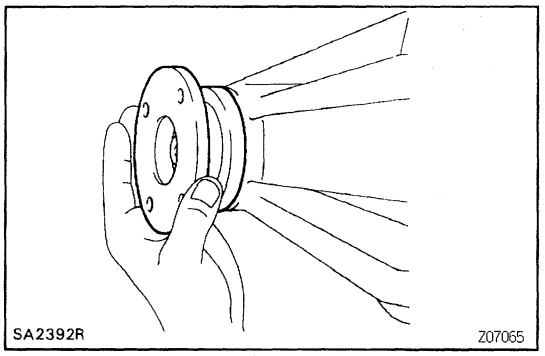
7. INSTALL NEW BEARING SPACER
Install a new bearing spacer.



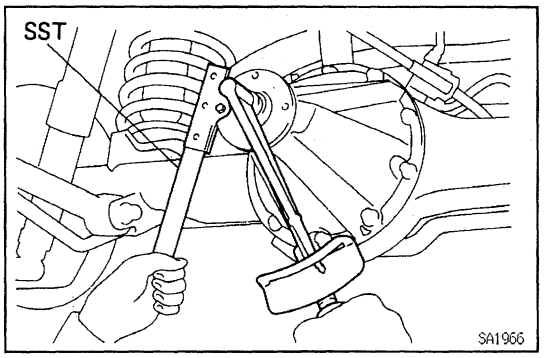
8. INSTALL BEARING OUTER RACE
Using SST, drive in the bearing outer race.
SST 09316–60010 (09316–00010, 09316–00020)
9. INSTALL FRONT BEARING



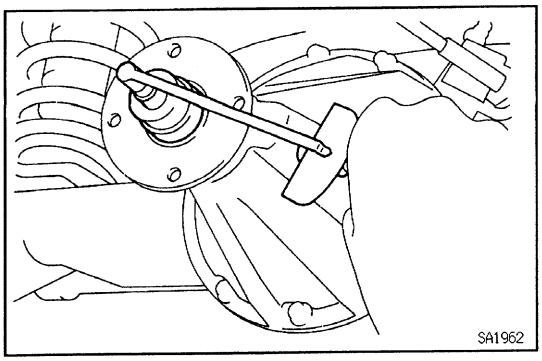
10. INSTALL OIL SLINGER AND NEW OIL SEAL
(a) Install the oil slinge
(b) Using SST, drive in a new oil seal as shown.
SST 09214–76011
Oil seal drive in depth:
1.0 mm (0.039 in.)
(c) Apply MP grease to the oil seal lip.



11. INSTALL COMPANION FLANGE
(a) Install the companion flange on the drive pinion.
(b) Place the washer on the companion flange.



(c) Apply light coat of gear oil on threads of a new companion flange nut.
(d) Using SST to hold the flange, torque the nut.
SST 09330–00021
Torque: 245 N–m (2,500 kgf–cm, 181 ft–lbf)



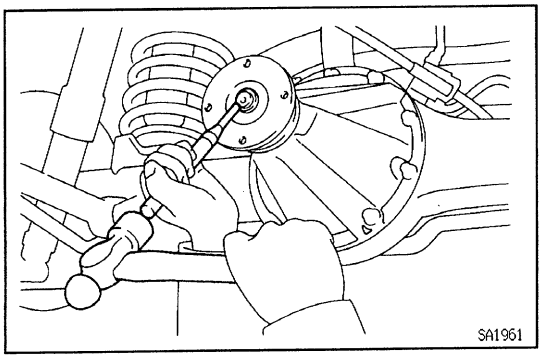
12. ADJUST DRIVE PINION PRELOAD

Using a torque wrench, measure the preioad of the backlash between the drive pinion and ring gear.
New bearing preload (at starting):
1.3–2.0 N–m (13–20 kgf–cm, 11.3–17.4 in.–lbf)
Reused bearing preload tat starting):
0.7–1.0 N –m (7–10 kgf–cm, 6.1– 8.7 in.–lbf)

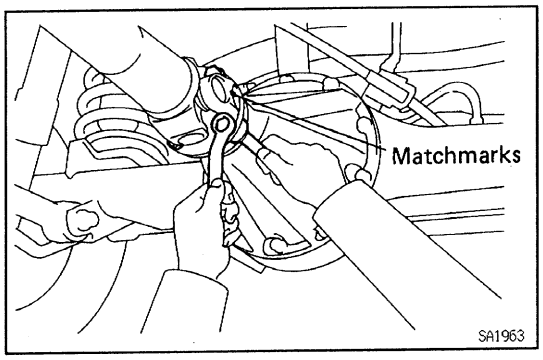
- If the preload is greater than specification, re–place the bearing spacer. .
- If the preload is less than specification,etig hten the nut 13 N–m (130 kgf–cm, 9 ft–lbf) a little at a time until the specified preload is reached.

Maximum torque: 441 N–m (4,500 kgf–cm, 325 ft–lbf)

If the maximum torque is exceeded while retightening the nut, replace the bearing spacer and repeat the preload procedure. Do not back off the pinion nut to reduce the preload.



13. STAKE DRIVE PINION NUT

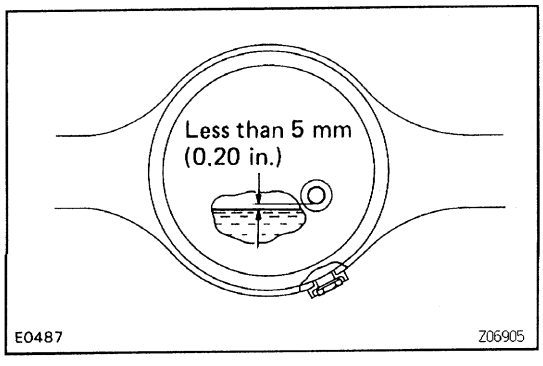


14. CONNECT REAR PROPELLER SHAFT

(a) Align the matchmarks and connect the propeller shaft to the companion flange with the 4 bolts spring wash–ers and nuts.

(b)

Torque the bolts and nuts.
Torque: 88 N–m (900 kgf–cm, 65 ft–lbf)



15. FILL DIFFERENTIAL WITH GEAR OIL

Oil type:
Hypoid gear oil API GL–5
Recommended oil viscosity:
Above –18° C (0° F) SAE 90
Below –18° C (0° F) SAE 80W or 80W – 90
Capacity:
3.25 liters (3.4 US qts, 2.9 Imp. qts)