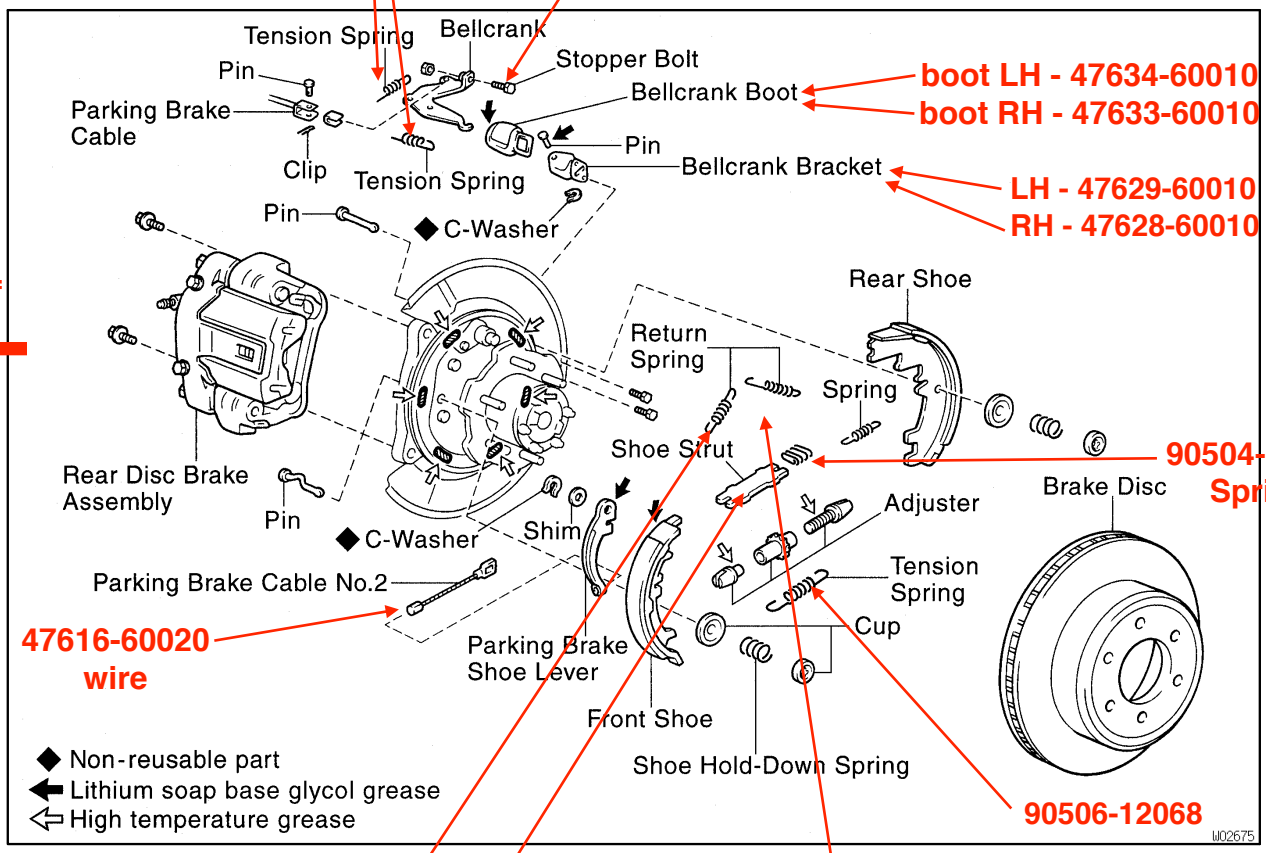
springs - 90506-20033 = 2 per bellcrank

PARKING BRAKE

COMPONENTS

BR1D7–01

bolt w/rubber bumper - 47639-30020



boot LH - 47634-60010

boot RH - 47633-60010

LH - 47629-60010

RH - 47628-60010

Front of Vehicle

90504-14002 Spring

47616-60020 wire

90506-12068

Front spring - 90507-20016 = 17 wraps or coils

Rear spring - 90507-23014 = 15 wraps or coils NB: this is the heavier spring

47613-60020 “dog bone”

BR1D8–04

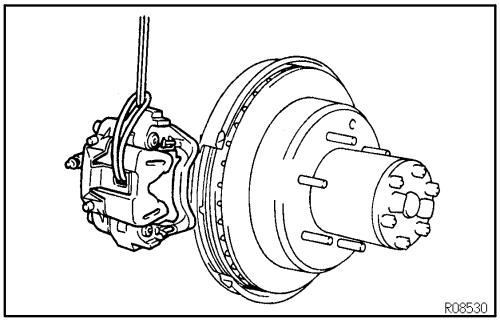
DISASSEMBLY

1. REMOVE REAR WHEEL

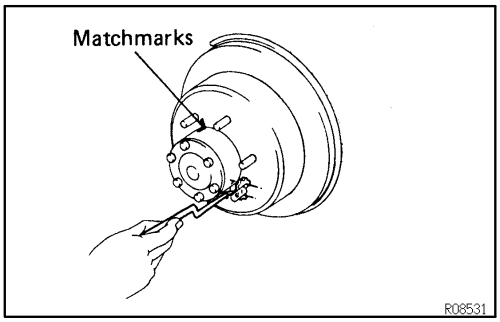
2. REMOVE REAR DISC BRAKE ASSEMBLY

(a) Remove the 2 mounting bolts and remove the disc brake assembly.

Torque: 88 N·m (900 kgf·cm, 65 ft·lbf)



(b) Suspend the disc brake assembly securely. Ensure that the hose is not stretched.

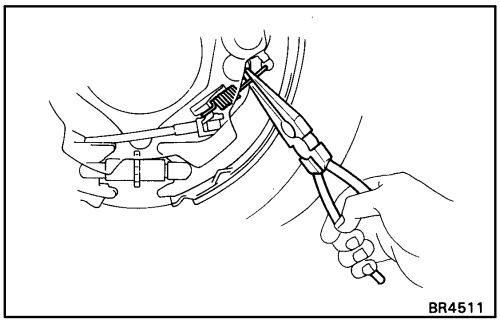


3. REMOVE DISC

Place the matchmarks on the disc and rear hub, and remove the disc.

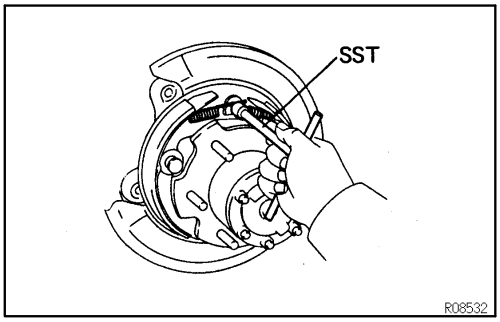
HINT:

If the disc cannot be removed easily, turn the shoe adjuster until the wheel turns freely.



4. REMOVE TENSION SPRING

Using needle–nose pliers, remove the tension spring.



5. REMOVE SHOE RETURN SPRINGS

Using SST, remove the shoe return springs.

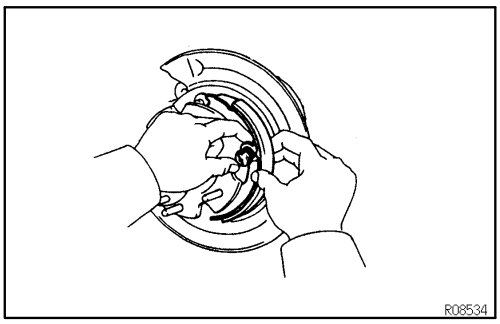
SST 09717–20010

HINT:

Using SST, install the front shoe return spring and then install the rear return spring.

SST 09718–20010

6. REMOVE SHOE STRUT WITH SPRING



7. REMOVE REAR SHOE, ADJUSTER AND TENSION SPRING

(a) Slide out the rear shoe, and remove the rear shoe and adjuster.

(b) Remove the 2 shoe hold–down spring cups, spring and pin.

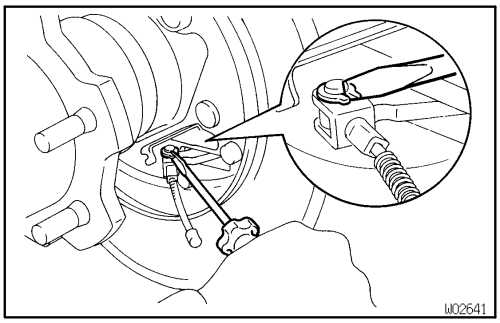
(c) Remove the lower side tension spring.

8. REMOVE FRONT SHOE

(a) Slide out the front shoe.

(b) Remove the shoe 2 hold–down spring cups, springs and pin.

(c) Disconnect the parking brake cable from the parking brake shoe lever.



9. IF NECESSARY, REMOVE AND DISASSEMBLE PARKING BRAKE BELLCRANK ASSEMBLY

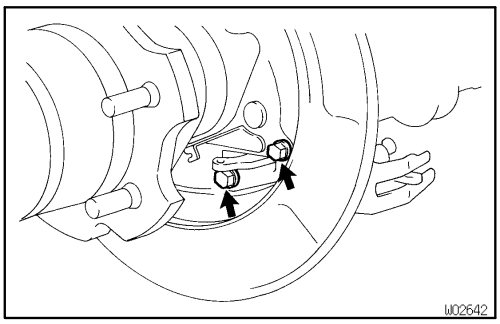
(a) Using a screwdriver, remove the C–washer.

(b) Remove the pin and disconnect the parking brake cable No.2 from the bellcrank.

(c) Remove the clip.

(d) Remove the pin and clip, then disconnect the parking brake cable.

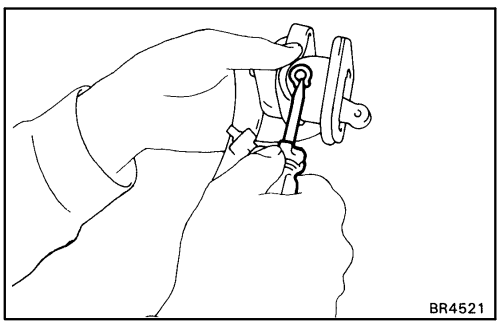
(e) Remove the 2 tension springs.



(f) Remove the 2 bolts and parking brake bellcrank assembly.

Torque: 13 N·m (130 kgf·cm, 9 ft·lbf)

(g) Remove the boot from parking brake bellcrank bracket.



(h) Using a screwdriver, remove the C–washer and pin.

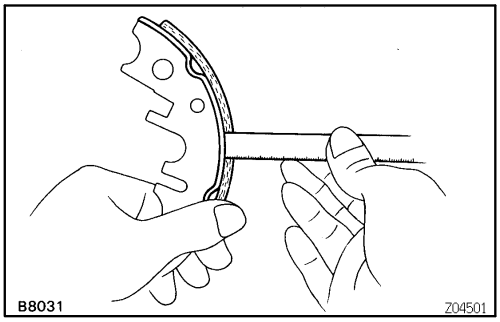
(i) Remove the parking brake bellcrank from the bell crank bracket.

BR1D9–02

INSPECTION

1. INSPECT DISASSEMBLED PARTS

Inspect the disassembled parts for wear, rust or damage.



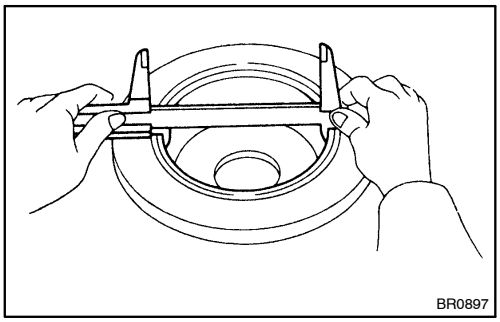
2. MEASURE BRAKE SHOE LINING THICKNESS

Using a ruler, measure the thickness of the shoe lining.

Standard thickness: 4.0 mm (0.157 in.)

Minimum thickness: 1.0 mm (0.039 in.)

If the lining thickness is at the minimum thickness or less, or if there is extremely uneven wear, replace the brake shoe.



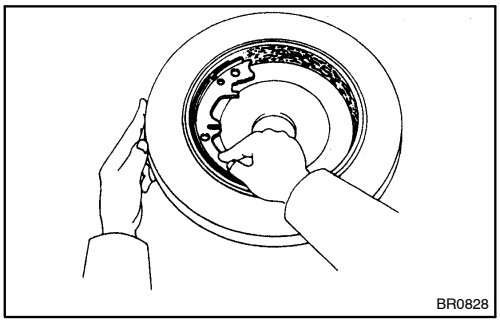
3. MEASURE BRAKE DISC INSIDE DIAMETER

Using a vernier calipers, measure the inside diameter of the disc.

Standard inside diameter: 230 mm (9.06 in.)

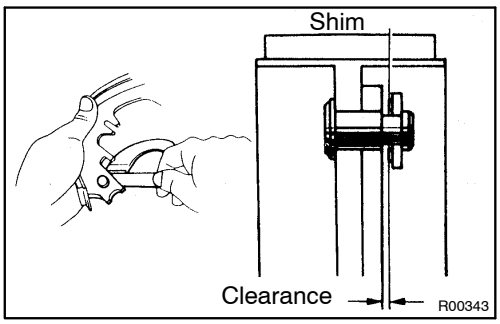
Maximum inside diameter: 231 mm (9.09 in.)

Replace the disc if the inside diameter is at the maximum value or more. Replace the disc or grind it with a lathe if the disc is scored or is worn unevenly.



4. INSPECT PARKING BRAKE LINING AND DISC FOR PROPER CONTACT

Apply chalk to the inside surface of the disc, then grind down the brake shoe lining to fit. If the contact between the disc and the brake shoe lining is improper, repair it using a brake shoe grinder or replace the brake shoe assembly.



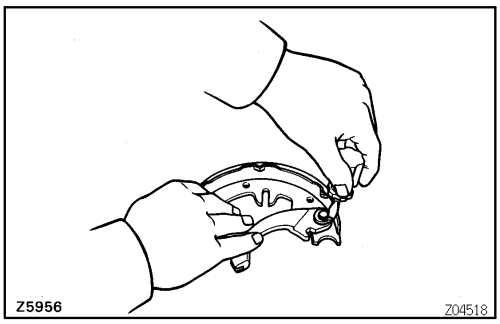
5. MEASURE CLEARANCE BETWEEN PARKING BRAKE SHOE AND LEVER

Using a feeler gauge, measure the clearance.

Standard clearance: Less than 0.35 mm (0.0138 in.)

If the clearance is not within the specification, replace the shim with one of the correct size.

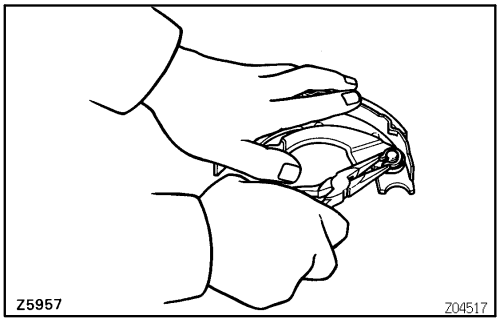
Shim Thickness	Shim Thickness
0.3 mm (0.012 in.)	0.9 mm (0.035 in.)
0.6 mm (0.024 in.)	



6. IF NECESSARY, REPLACE SHIM

(a) Using a screwdriver, remove the C–washer.

(b) Remove the parking brake shoe lever, and install the correct size shim.



(c) Using needle–nose pliers, install the parking brake shoe lever with a new C–washer.

(d) Remeasure the clearance.

BR1DA–01

REASSEMBLY

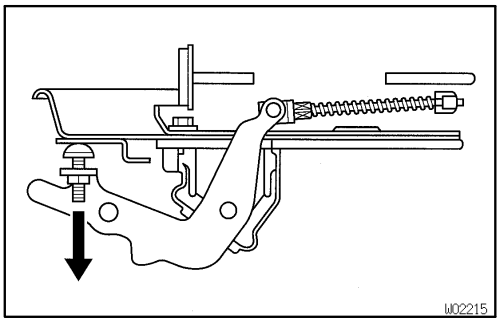
Reassembly is in the reverse order of disassembly (See page BR–40).

NOTICE:

Apply high temperature grease and lithium soap base glycol grease to the parts indicated by the arrows (See page BR–39).

1. ADJUST PARKING BRAKE SHOE CLEARANCE

(a) Disconnect the PKB cable from bellcrank and remove the 2 tension springs.
(b) Loosen the stopper bolt.
(c) Temporarily install the hub nuts.
(d) Remove the hole plug.
(e) Turn the adjuster and expand the shoes until the disc locks.
(f) Return the adjuster 8 notches.
(g) Install the hole plug.



2. ADJUST BELLCRANK

(a) Pull the bellcrank until all play in the interior linkage is taken up.
(b) Screw in the bellcrank adjusting bolt to where it contacts on the dust seal.
(c) Loosen it one turn, and lock it at that position with the lock nut.

Torque: 5.4 N·m (55 kgf·cm, 48 in.·lbf)

(d) Install the bellcrank spring.
(e) Connect the PKB cable to the bellcrank.

3. BEDDING DOWN PARKING BRAKE SHOES AND DISC

(a) Drive the vehicle at about 50 km/h (31 mph) on a safe, level and dry road.
(b) With the parking brake release button pushed in, pull on the lever with 88 N (9 kgf, 19.8 lbf) of force.
(c) Drive the vehicle for about 400 meters (0.25 mile) in this condition.
(d) Repeat this procedure 2 or 3 times.

4. RECHECK AND ADJUST PARKING BRAKE LEVER TRAVEL