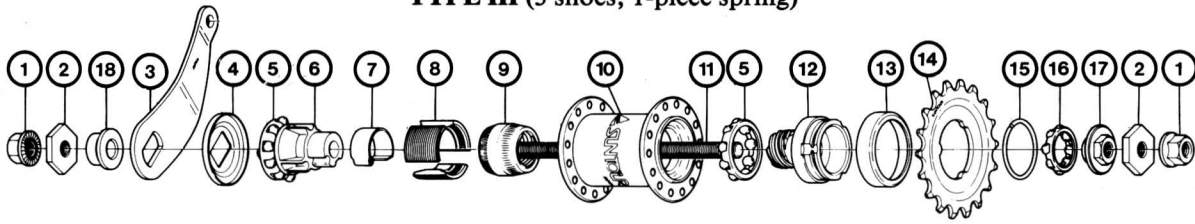


**SUNTOUR COASTER BRAKE PARTS
INTERCHANGEABILITY**

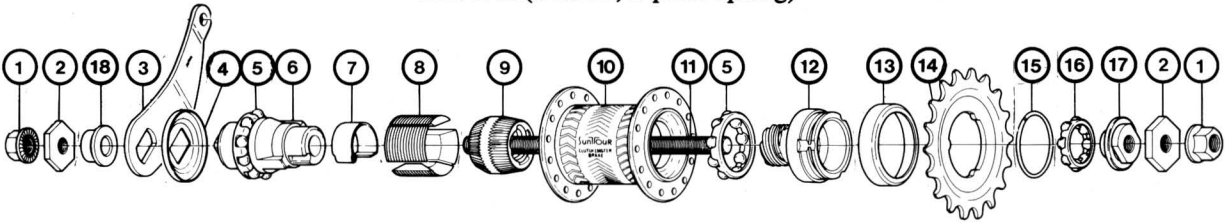
HUBS 

SUTHERLAND'S HANDBOOK OF COASTER BRAKES AND INTERNALLY-GEARED HUBS

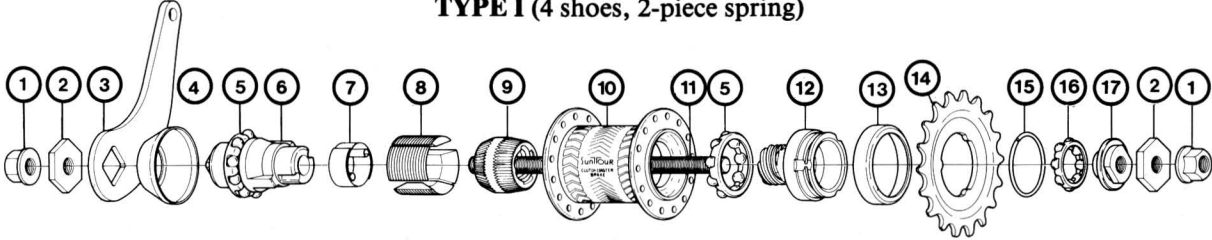
TYPE III (3 shoes, 1-piece spring)



TYPE II (4 shoes, 1-piece spring)



TYPE I (4 shoes, 2-piece spring)



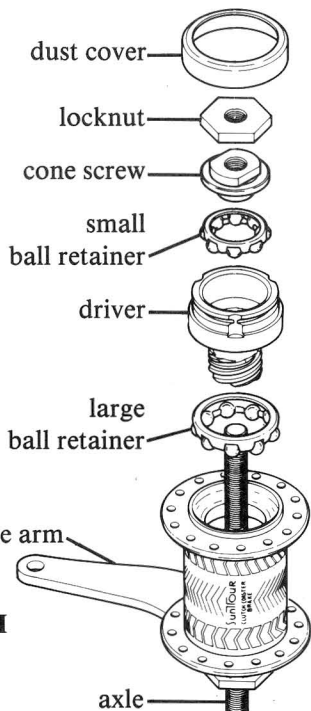
	Type III	Type II	Type I
1. Axle Nut	4200 5800	4200 5800	4200 5800
2. Locknut, 4 mm thick 5 mm thick	4200 5700	4200 5700 4200 5701	4200 5700 4200 5701
3. Arm	4200 1006	4200 1004	4200 1000
4. Dust Cap B	4200 1508	4200 1508	4200 1500
5. Ball Retainer B	4200 8800	4200 8800	4200 8800
6. Brake Cone	4200 0710	4200 0704	4200 0700
7. Clutch Spring	4200 7006	4200 7006	4200 7002
8. Brake Shoe	4200 0807	4200 0800	4200 0800
9. Clutch Cone	4200 0608	4200 0600	4200 0600
10. Hub Shell, 20 H, 3.2 mm 28 H, 3.2 mm 36 H, 3.2 mm 20 H, 2.8 mm 28 H, 2.8 mm 36 H, 2.8 mm	4200 9014 4200 9011 4200 9013 4200 9015	4200 9010 4200 9012 4200 9014 4200 9011 4200 9013 4200 9015	4200 9010 4200 9012 4200 9014 4200 9011 4200 9013 4200 9015
11. Axle, 152 mm 162 mm 170 mm	4200 0302 4200 0305 4200 0307	4200 0301 4200 0304 4200 0306	4200 0301 4200 0304 4200 0306
12. Driver	4200 0402	4200 0400	4200 0400
13. Dust Cap A	4200 1600	4200 1600	4200 1600
16. Ball Retainer A	4011 9023	4011 9023	4011 9023
17. Cone Screw	4200 9000	4200 9000	4200 9000
18. Arm Bushing	4200 1211	4200 1211	

HUBS

SUNTOUR COASTER BRAKE (cont.)
DISASSEMBLY AND ASSEMBLY

1 DISASSEMBLY

Remove dust cover, right-hand locknut, cone screw, small ball retainer, driver and large ball retainer.



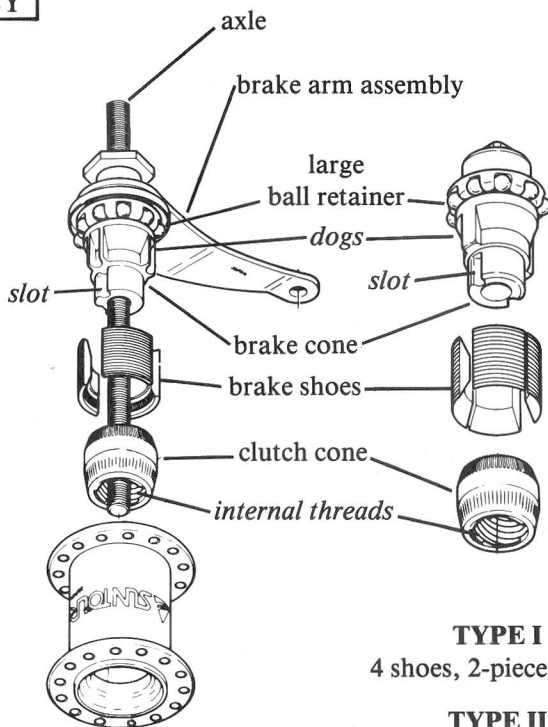
Holding axle in place, turn hub over. Install large ball retainer, *flat side up*. Install driver and small ball retainer. Thread on screw cone and locknut. Adjust bearing. Replace dust cover.

ASSEMBLY 3

TYPE I, II and III

2 DISASSEMBLY

Without inverting assembly, lift hub shell clear of remaining parts. Catch brake shoes as they fall out. Remove clutch cone assembly.



Insert brake arm axle assembly into hub with brake cone dogs in gaps between brake shoes and ball retainer seated on hub shell race. Slot(s) in brake cone must engage loop(s) in clutch spring.



Drop clutch cone assembly into hub shell *threaded end inward*. Stick greased brake shoes in place inside hub.

TYPE III
3 shoes, 1-piece spring

TYPE I
4 shoes, 2-piece spring

TYPE II
(not shown)
4 shoes, 1-piece spring

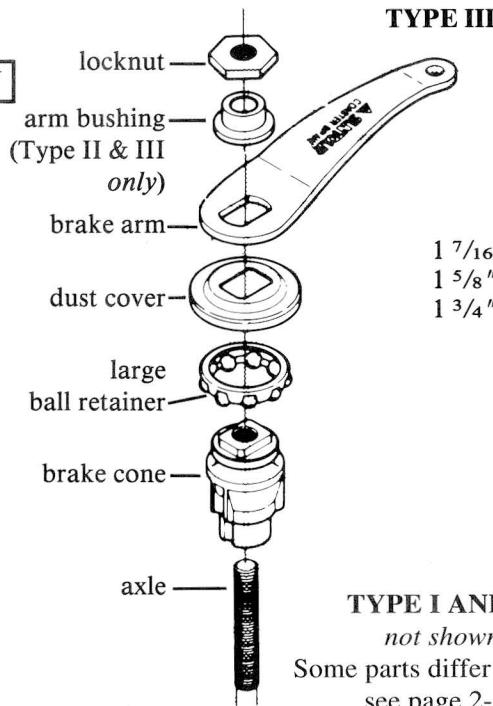
ASSEMBLY 2

**SUNTOUR COASTER BRAKE
DISASSEMBLY AND ASSEMBLY (cont.)**

HUBS 

3 DISASSEMBLY

Position assembly *brake arm up*. Use a soft-jawed vise if gripping threads. Remove left-hand locknut, arm bushing (Type II & III only), brake arm and dust cover. Pop ball retainer off brake cone. If necessary, thread brake cone off axle.



If it was removed, thread on brake cone until the proper length of axle protrudes from square end:
 1 7/16" (36 mm) for 6" (152 mm) axle
 1 5/8" (41 mm) for 6 3/8" (162 mm) axle
 1 3/4" (45 mm) for 6 11/16" (170 mm) axle
 Place large ball retainer over brake cone *flat side up*. Use dust cover to pop retainer into place. Install brake arm, arm bushing and locknut. Do not let axle or brake arm turn while tightening locknut.

TYPE I AND II

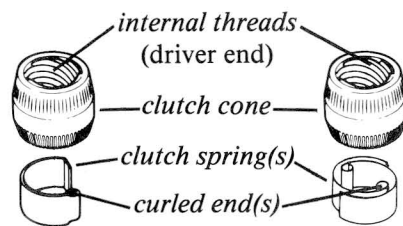
not shown
 Some parts differ slightly; see page 2-16

ASSEMBLY 1

DISASSEMBLY

Push clutch spring(s) out of clutch cone. Be careful not to deform spring(s).

SUBASSEMBLY



TYPE II and III

TYPE I

Orient clutch cone and spring(s) *as shown*. Insert spring(s) into clutch cone. If installed upside down, brake will not engage.

ASSEMBLY

CLEANING

Clean all parts, including outside of hub shell, in a suitable solvent. Be very careful not to introduce dirt or grit after cleaning.

POINTS TO CHECK

Numbers in parentheses refer to parts chart and exploded drawing.

1. Mating threads of driver (12) and clutch cone (9) for rough action, wear and chipping.
2. Mating coned surfaces inside hub shell (10) and outside driver end of clutch cone (9).
3. Clutch spring(s) (7) for cracks, wear and distortion. Replace spring if thickness is anywhere less than 0.4 mm (1/64").
4. Brake-shoe side of clutch cone (9) for

wear and glazing.

5. Brake shoes (8) and hub shell inner surfaces for wear and glazing. If replacing brake shoes, replace *as a set*.
6. Bearing surfaces of cone screw (17), brake cone (6), driver (12) and hub shell for wear and pitting.
7. All threaded parts for damaged or stripped threads.
8. Dust caps and bearing retainers for straightness.

LUBRICATION

Lubricate ball bearings by filling the spaces between balls with grease. Lubricate hub shell and brake shoes liberally with a high-temperature grease. Coat other parts with grease.