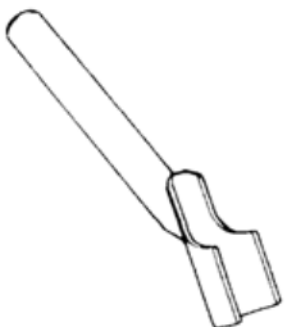
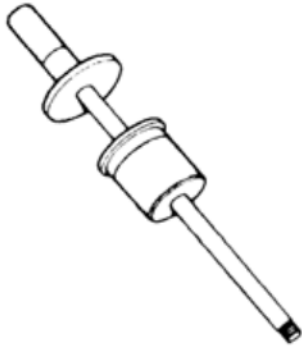
 Bearing install tool	 Spacer disassembly tool	 Spacer disassembly tool
 Handle	 Puller slide hammer	 Puller
 5th gear lock tool	 E-ring install tool	

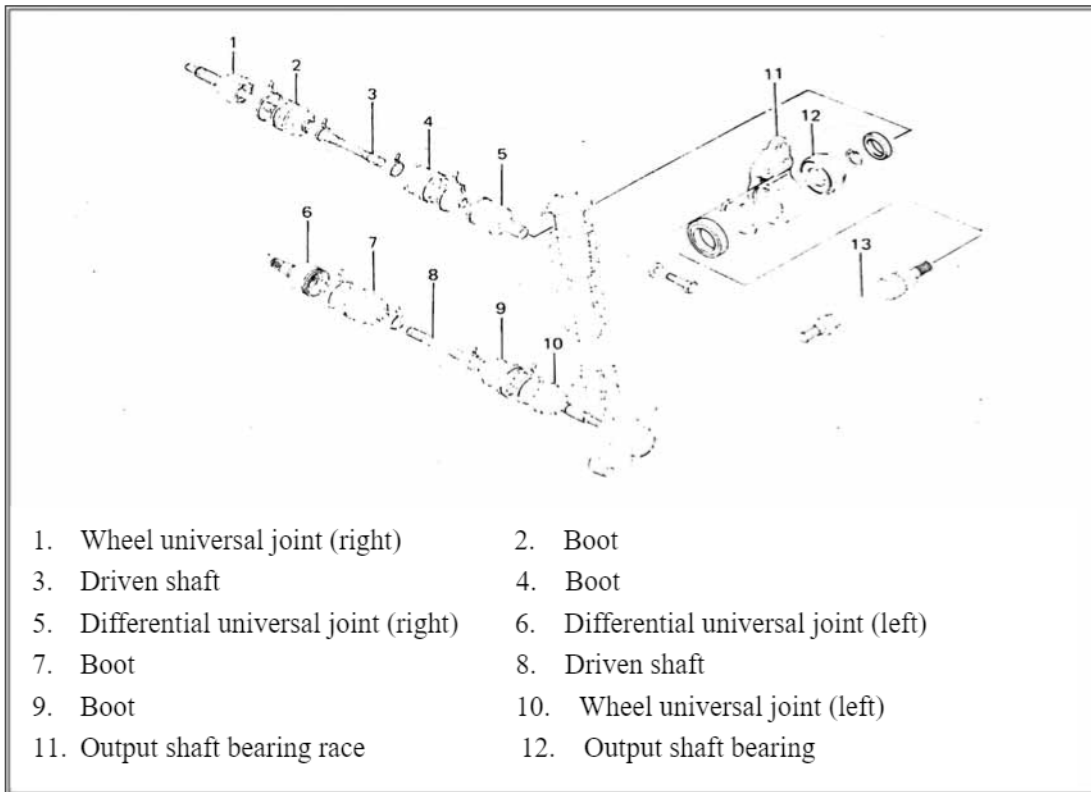
Chapter 6 Propeller Shaft

Universal joint

This propeller shaft is available for the vehicles with manual transaxles.

I. Summarization

The front wheel driven shaft adopts universal joint and the differential.

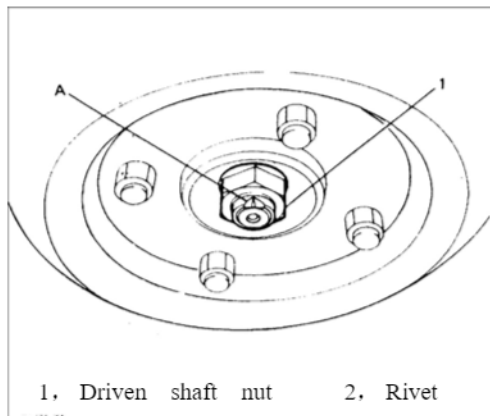


II. Disassemble

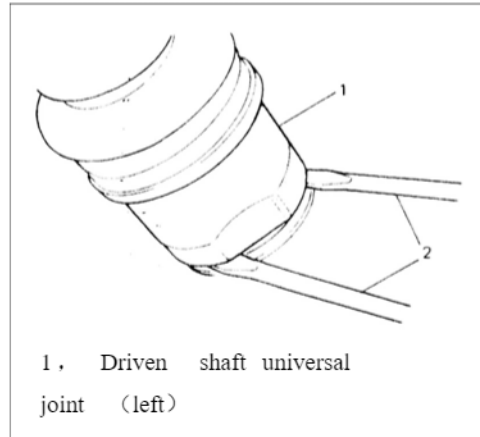
1. Disassemble the left shaft.

On the ground:

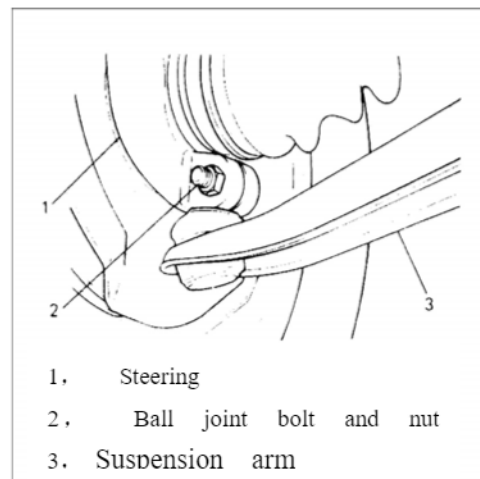
Loosen the rivet, remove the propeller shaft nut and gasket on the Lift



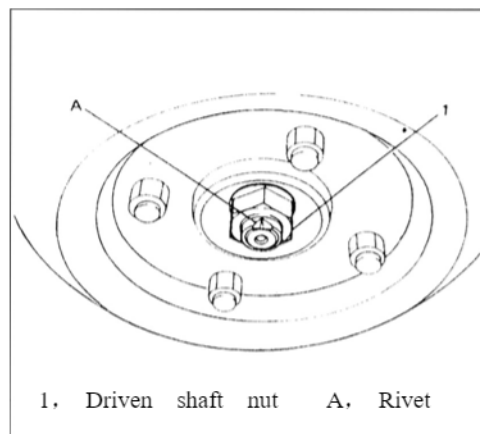
- (1) Let out the transaxles oil.
- (2) Remove the driven shaft universal joint to make the snap ring. Break away from the differential universal joint splined hub.



- (3) Remove the joint from the Suspension arm.
- (4) Remove the ball joint bolt and nut and disconnect the suspension arm from the steering .



- (5) For disassembling the propeller shaft assembly, first pull out the inner universal joint, second pull out the wheel universal joint from the steering .



Caution: When disassembling the propeller shaft assembly,
Be sure to prevent the rough touch and collision.

2. Disassembling the right shaft.

On the ground:

Loosen the rivet and remove the propeller shaft nut and gasket .



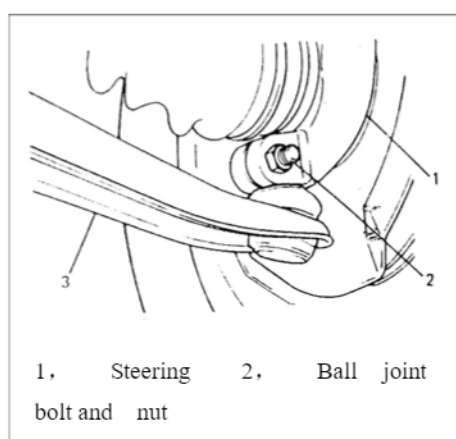
On the lift:

(1) Use plastic hammer to knock the propeller shaft universal joint to break the snap ring away from differential universal joint splined hub.

(2) Disconnect the joint from the suspension arm.

(3) Remove the ball joint bolt and nut, and then disconnect the suspension arm from the steering.

(4) For disassembling the propeller shaft assembly, first pull out the inner universal joint from the output shaft, secondly pull out the end of wheel universal joint from the universal joint.



Caution: When disassembling the propeller shaft assembly, be sure to prevent the rough touch and collision.

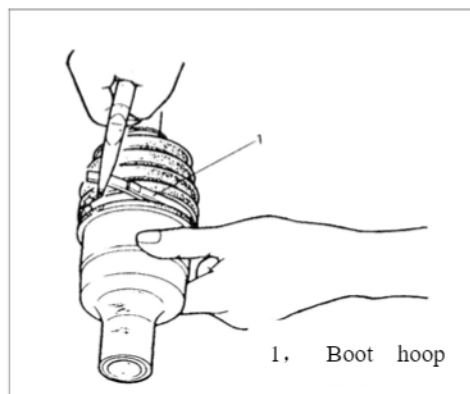
(5) Let out the transaxles oil.

(6) Loosen the central bearing seat bolt, remove the output shaft from differential side gear.

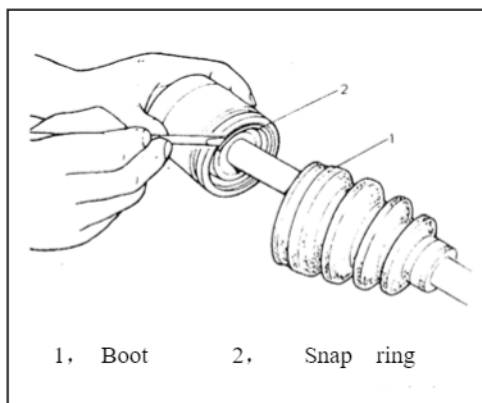


3. Disassemble the propeller shaft.

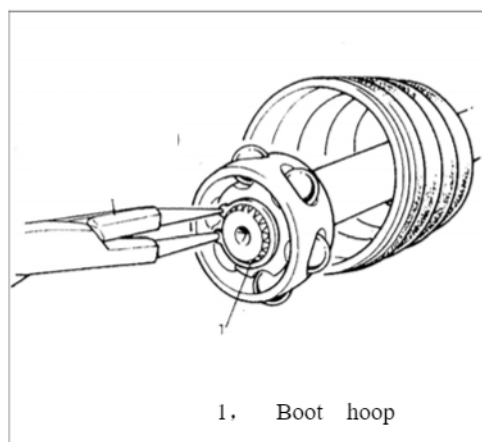
(1) Remove the differential universal joint boot hoop.



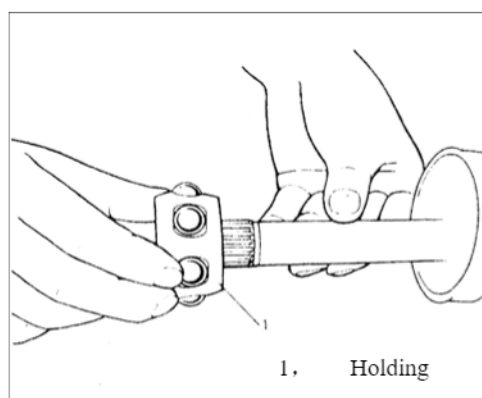
(2) Move the boot to the middle position and take out the shaft from the bell-mouthed.



- (3) Scrape off the lubricant and remove the holding snap ring with special tool (A).



- (4) Draw out the holding and boot.



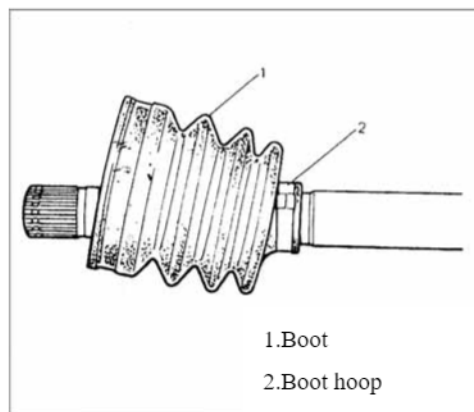
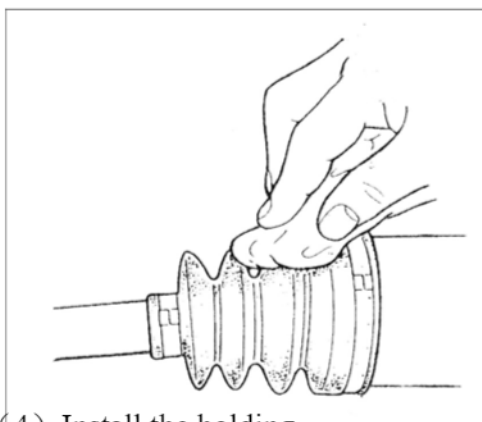
Notice:

The end of wheel universal joint.

III, Installation

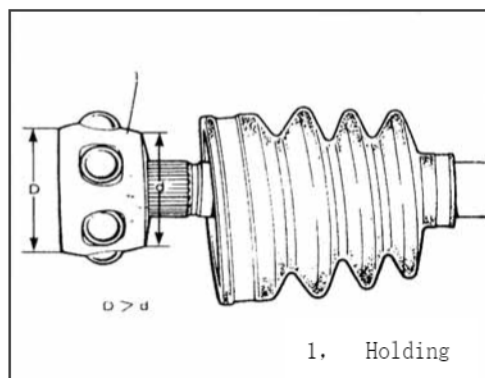
1, Installation of propeller shaft.

- (1) Clean the parts (except the boot) and dry the parts with compressed air.
- (2) Use a piece of clean and dry cloth to clean the boot, be sure not to use skim milk (such as gasoline or coal oil).
- (3) Put the boot onto the axle till the small diameter set in the shaft slot and fix the hoop.

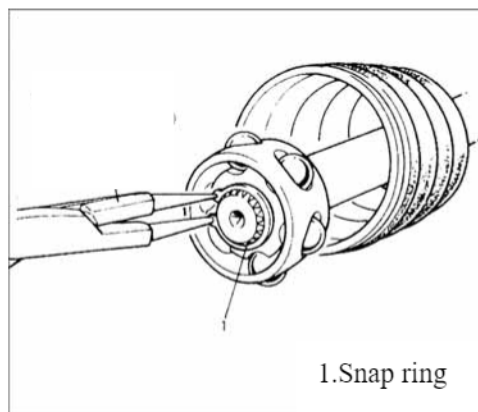


(4) Install the holding .

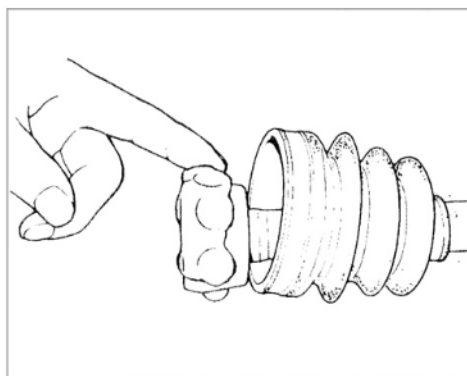
Caution: When installing the holding, keep the small diameter towards the shaft end.



(5) Use special tool (A) to install the snap ring.

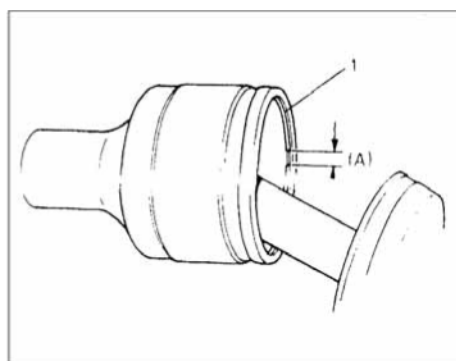


(6) Spread 30-40 g of SUZUKI high class grease H on the surface of the holding.

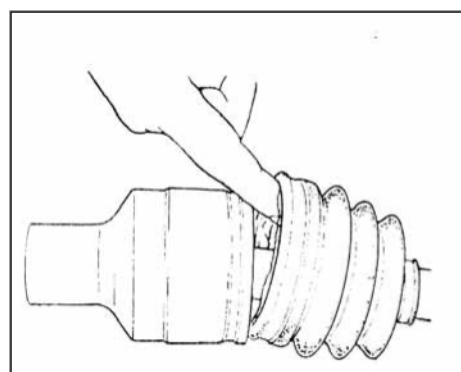


(7) . Put the holding into the bell-mouthed, and then put the snap ring in the snap ring slot.

Caution: snap ring hatch (A) can not aim at the ball.

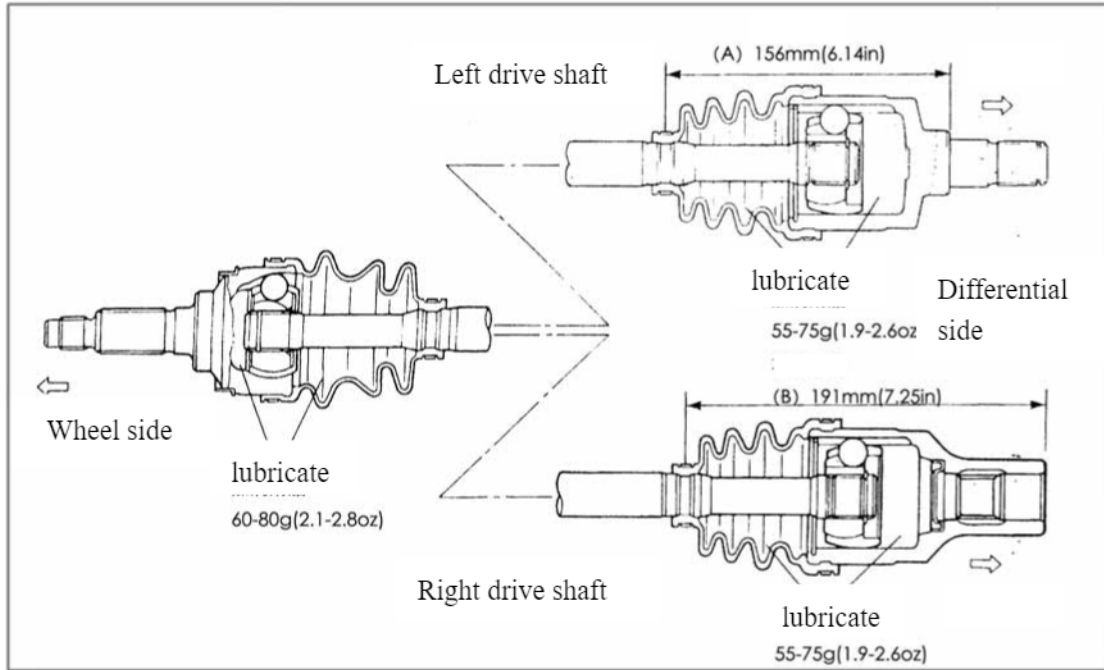


(8) Fill in 23-35g of SUZUKI high class grease H, put the boot on the bell-mouth, Then install boot on bell-mouth.



After installing the boot, insert a driven screw into bell-mouthed boot, send air into boot.

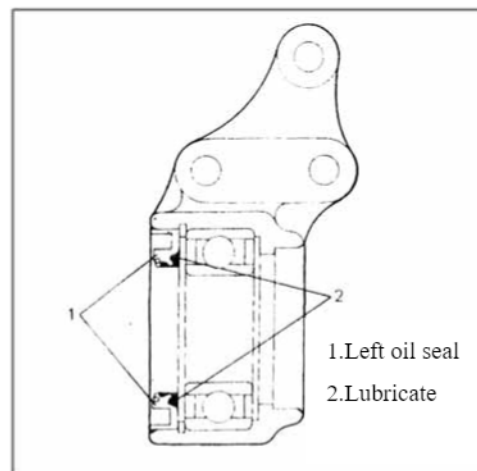
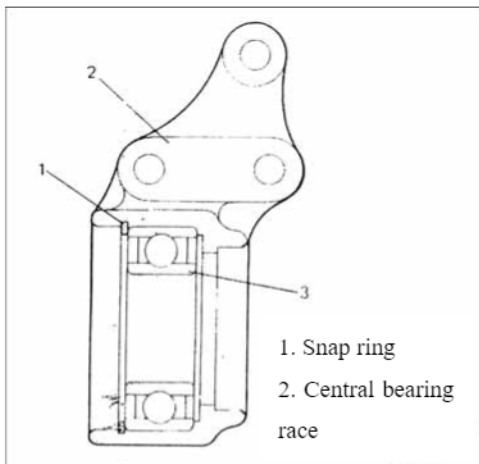
9. Fix the boot on the bell-mouthed. Adjust the measure (A) and (B) to accord with the fig. Below.



(2) install output shaft and bearing race.

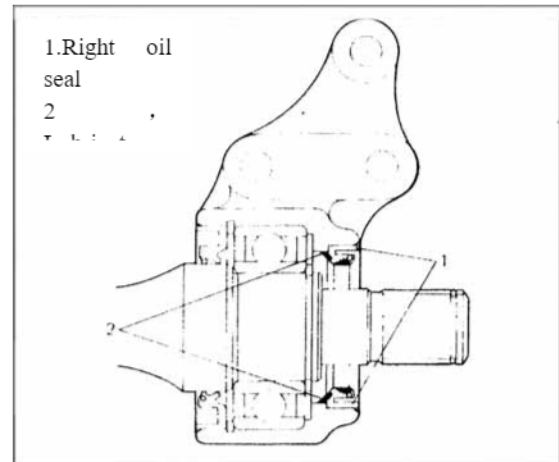
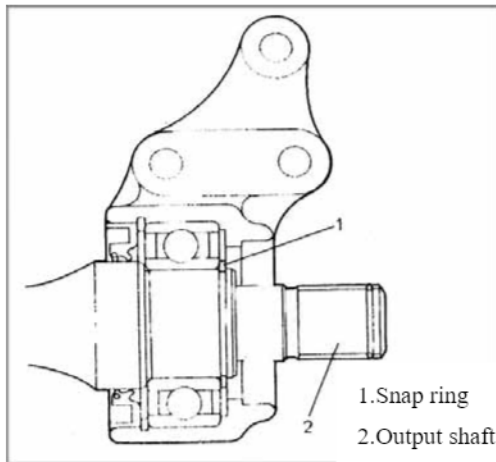
Install the output shaft according to the reverse order and pay attention to the followings.

When installing the bearing race snap ring, be sure the snap ring has been fixed tightly in the central bearing race snap ring slot; keep the left oil seal in the right direction shown in the fig. below.



Fix the snap ring tightly in the snap ring slot.

When install the right oil seal, keep the right direction shown in the fig. below.



VI, Installation

Install the propeller shaft assembly according to the reverse order, clean the front wheel bearing oil seal and spread lubricant.

First install the end of wheel universal joint on the steering and then install the universal joint on the end of differential.

Manual transaxles drain plug seal.

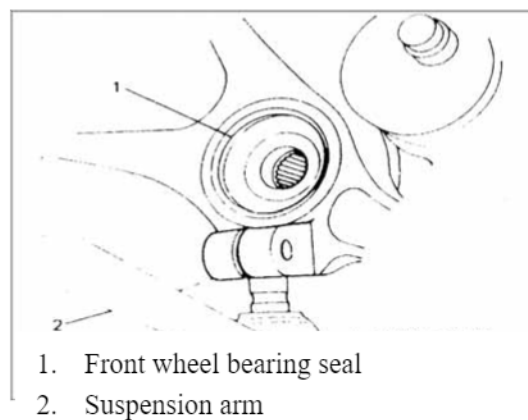
Fill up the transaxles.

Caution:

Do not hurt oil seal and boot.

Do not hammer the universal joint boot to adjust, use the hands to insert the universal joint.

Be sure the differential universal joint has been inserted to the right position and the snap ring has been placed on the original position.



**V. Recommended Value of torque**

Screw down parts		Torque		
		N·m	kg·m	lb·ft
Drain plug	Manual transaxles	25-30	2.5-3.0	18.5-21.5
	Automatic transaxles	18-23	1.8-2.3	13.5-16.5
Oil level, refill plug	Manual transaxles	36-54	3.6-5.4	26.5-39.0
Ball joint bolt and nut		50-70	5.0-7.0	36.5-50.5
Propeller shaft nut		150-200	15.0-20.0	108.5-144.5
Central bearing race bolt		40-60	4.0-6.0	29.0-43.0
Joint nut		18-28	1.8-2.8	13.5-20.0

Maintenance Materials Needed

Materials	Recommended SUZUKI Products	Used Parts
Lithium lubricator	SUZUKI lubricator A (99000-25010)	Oil seal
Seal sub	SUZUKI glue 1215 (99000-31110)	Manual transaxles Drain plug
Lubricator	SUZUKI lubricator (99000-25120)	Driven shaft universal joint