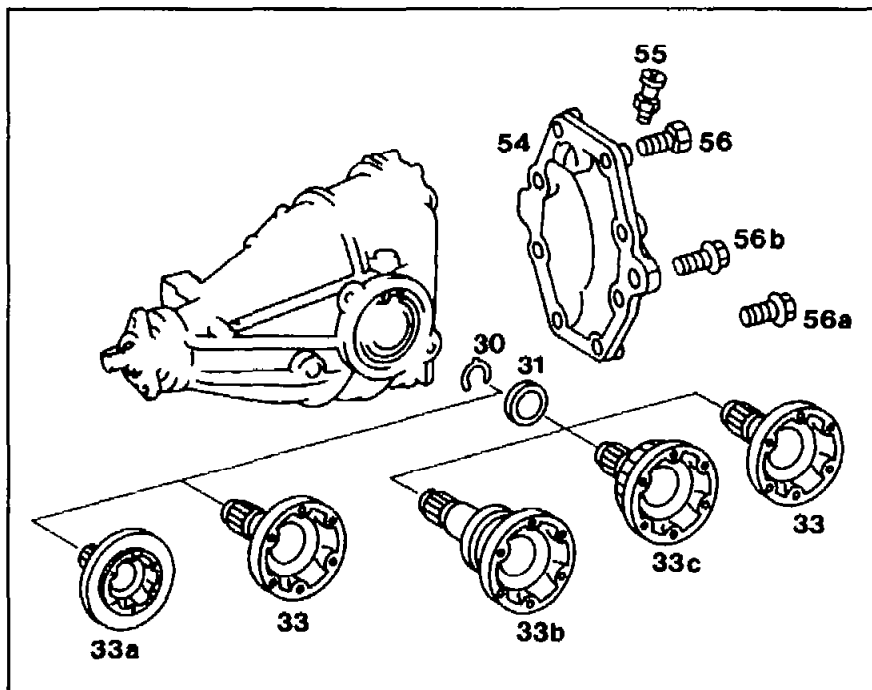


35-670 Removal and installation of connecting flange of rear axle shaft

Preceding work:
Removal and installation of rear axle center assembly
(35-520).

Operation no. of operation texts and work units
or standard texts and flat rates:
35-0180, 35-0181, 35-0183



P35-5570-35

Rear axle oil	Drain, fill. Filling height up to lower edge of filler opening. Tightening torque of sealing plug 50 Nm (number 1).
Rear axle center assembly (50)	Clamp in clamping fixture (number 2). Rear axle center assembly with 168 mm dia. crown wheel, clamping fixture 201 589 03 31 00, and rear axle center assembly with 185/210 mm dia. crown wheel, clamping fixture 129 589 00 31 00.
Rear axle closing plate (54)	Remove, install. Clean sealing surfaces and coat with sealing agent. Tightening torque of hexagon bolts (56) in strength class 8.8 = 45 Nm, 10.9 = 50 Nm, for collar bolts (56a) = 55 Nm (number 3). Torque wrench 001 589 66 21 00.
Circlip (30)	Remove, replace and install. Hook 116 589 01 62 00 (number 4).

With 168 mm dia. crown wheel

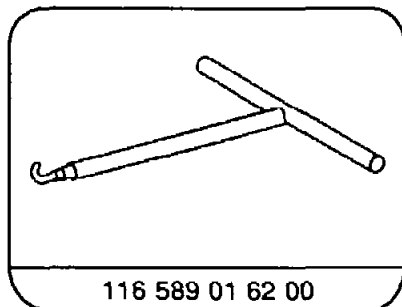
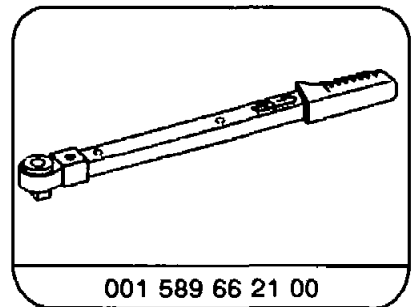
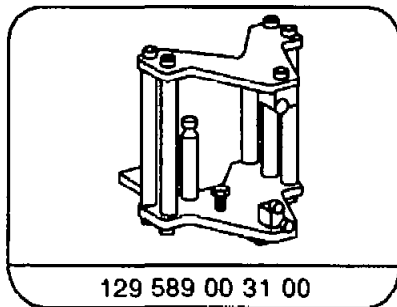
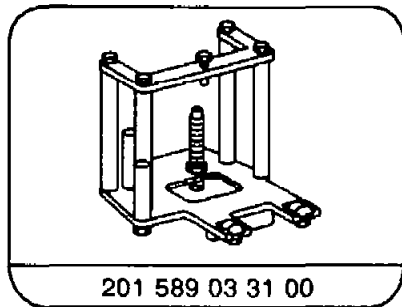
Connecting flange (33/33a) Remove, install, check and adjust axial play (number 4).

With 185/210 mm dia. crown wheel

Connecting flange (33, 33b, 33c) with spacer ring (31) Remove, install. Check axial play of connecting flanges, adjust if required. Not in the case of ASD rear axle center assemblies (number 5).

Rear axle breather (55) Replace. Tightening torque 25 Nm (number 6).

Special tools



Types of oil and capacity

Standard differential	SAE 90 hypoid gear oil, refer to Specifications for Service Products, sheet no. 235
Differential with ASD (information plate on rear axle housing)	special hypoid gear oil, refer to Specifications for Service Products, sheet no. 235.3
Capacity	with 168 mm dia. crown wheel, 0.7 liters, with 185 mm dia. crown wheel, 1.1 liters, with 201 mm dia. crown wheel, 1.3 liters.

Circlips for adjusting axial play with 168 mm dia. crown wheel

Thickness	1.20–1.80 mm
Graduation	0.05–0.05 mm

Spacers for adjusting axial play with 185 mm dia. crown wheel

Thickness	0.7–1.5 mm
Graduation	0.1 to 0.1 mm

Spacers for adjusting axial play with 201 mm dia. crown wheel

Thickness	2.6–3.4 mm
Graduation	0.1 to 0.1 mm

Removal, Installation

- 1 Drain rear axle oil.

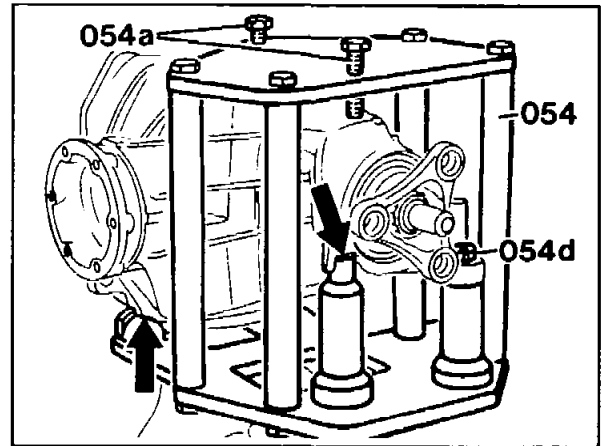
Installation note

Filling height up to lower edge of filler opening.
For types of oil and capacities, refer to Technical Data. Tightening torque of sealing plug, 50 Nm.

2 Clamp rear axle center assembly in clamping fixture (054). At the same time ensure proper seating of the housing in the clamping fixture (arrows).

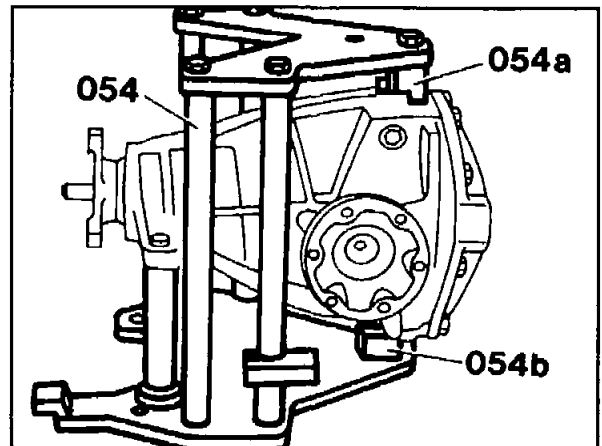
Clamping fixture for rear axle center assembly with 168 mm dia. crown wheel 201 589 03 31 00 and with 185/210 mm dia. crown wheel, 129 589 00 31 00

Location with 168 mm dia. crown wheel



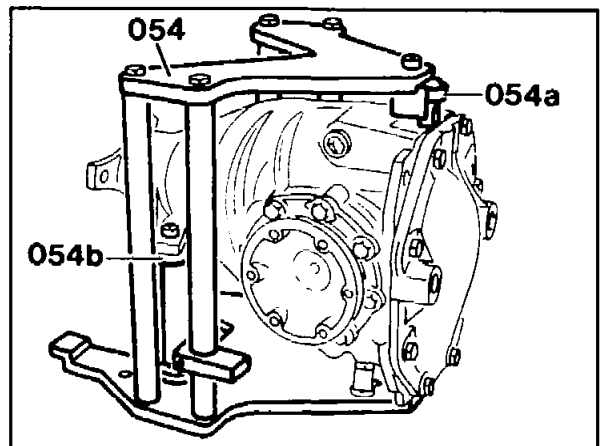
P35-5196-13

Location with 185 mm dia. crown wheel



P35-5561-13

Location with 210 mm dia. crown wheel

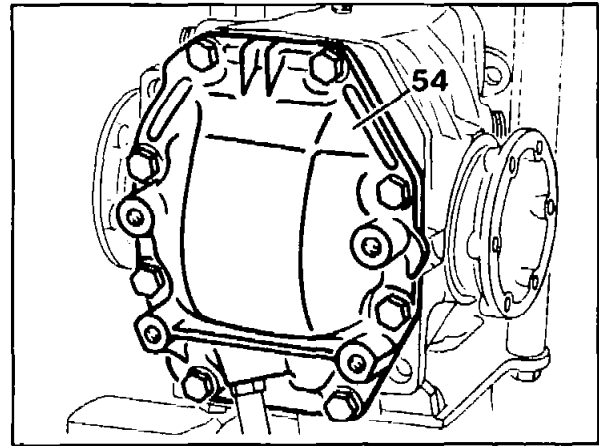


P35-5384-13

3 Remove rear axle closing plate (54) from rear axle housing.

Installation note

Clean sealing surfaces on rear axle closing plate and rear axle housing, and coat with sealing compound. Tightening torque of hexagon bolts (56) in strength class 8.8 = 45 Nm, 10.9 = 50 Nm and for collar bolts 55 Nm. Torque wrench 001 589 66 21 00.



P35-5197-13

168 mm dia. crown wheel

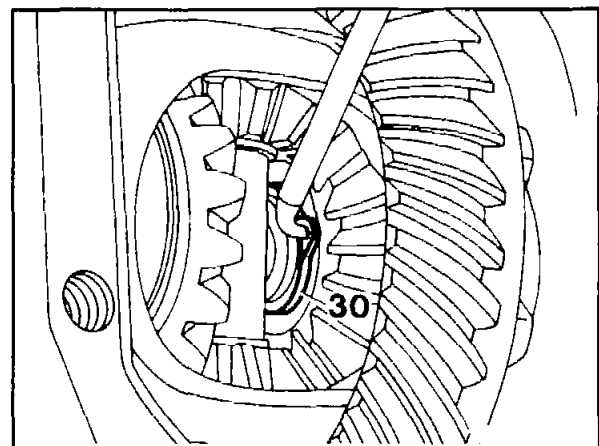
4 Detach circlip (30) from connecting flange, using hook 116 589 01 62 00.

Installation note

Replace circlip.

168 mm dia. crown wheel

Check axial play. There should not be any detectable play. However the circlip should still be able to turn in the groove. If required, install thinner or thicker circlip.

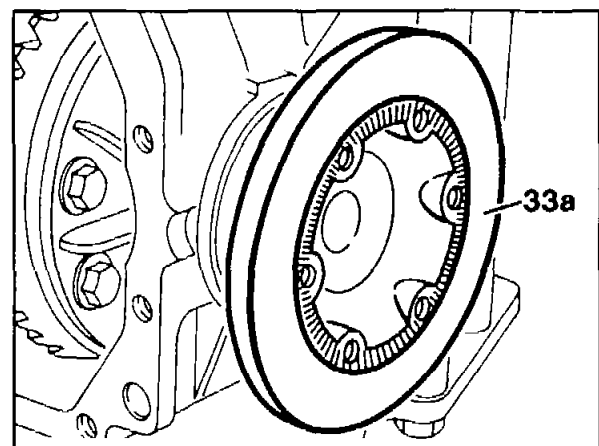


P35-5317-13

5 Withdraw connecting flange (33a) from differential side gear.

Installation note

Check contact surface on connecting flange for the radial sealing ring, if required, in the event of a contact surface with severe wear, replace connecting flange.

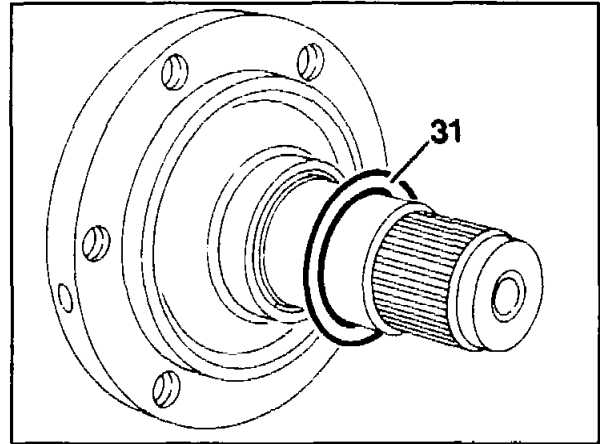


P35-5198-13

168 mm dia. crown wheel

185/210 mm dia. crown wheel

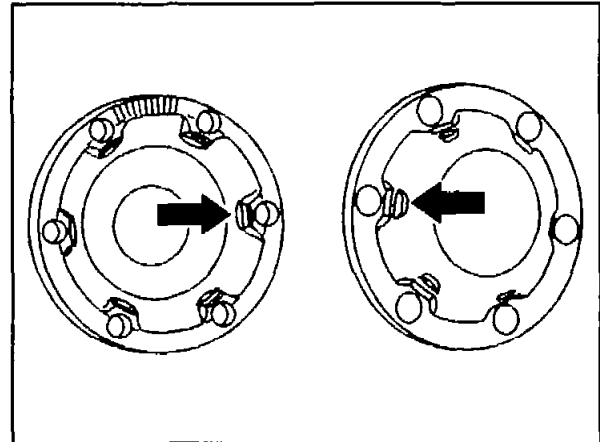
Check axial play (except on vehicles with ASD). There should be no detectable play. If required, install a suitably thicker or thinner spacer ring (31) (refer to Technical Data).



P35-5271-13

Note

As of 04/91, the rear axle shafts and the connecting flanges have been provided with a centering device (arrows). Centered connecting flanges with uncentered rear axle shafts (closing plate) can be assembled. By contrast, rear axle shafts **with** centering system and connecting flanges **without** centering system cannot be combined. In this case a closing plate without a centering system is to be installed if required and the quantity of grease transferred from the closing plate which has been fitted.



P35-5227-13

Connecting flange with centering system and rear axle shaft with embossing

6 Replace breather.

Installation note

Tightening torque 25 Nm.

7 Assemble in reverse sequence.