

Data

Max. speed of power steering pump	7000/min.
Circulation pressure	max. 5 bar gauge pressure (atü)
Pressure relief valve opens at	65 ± 5 bar gauge pressure (atü)

Oil grades/filling capacity and oil level checkup

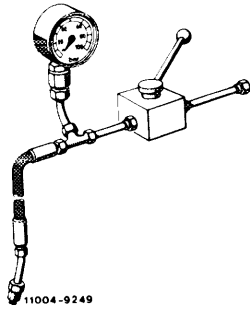

ATF refer to Specifications for service products, page 236.2
 or gear oil refer to Specifications for service products, page 237

Filling capacity approx. 1.5 liter

Oil level checkup: With the oil at operating temperature (approx. 80 °C) the oil level in supply tank should reach up to punched-in or cast-in mark (approx. 20 mm below edge of tank). With cold oil and at ambient temperature the oil level should be 6–8 mm below mark. For filling up, use only perfectly clean oil, since even minimum particles of dirt may cause trouble in hydraulic system.

Tightening torque	Nm	(kpm)
Coupling screw on high-pressure expanding hose	45–50	(4.5–5)

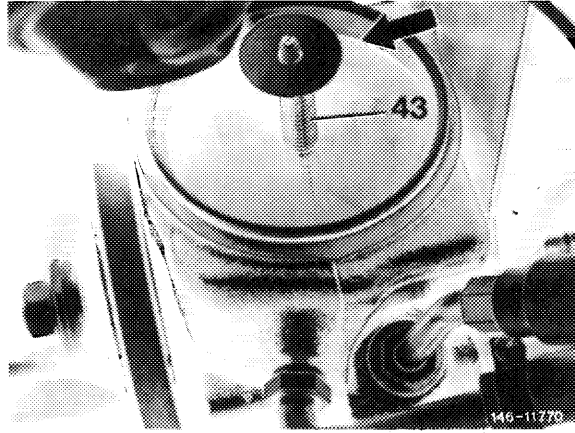
Special tool

Tester		115 589 13 21 00
Box wrench element, open 17 mm 1/2" square		000 589 68 03 00

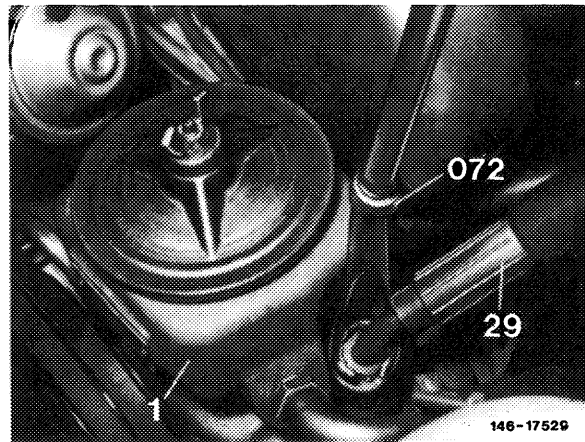
Checkup

1 Remove closing cover and draw off oil with a syringe, since otherwise the oil will run out when unscrewing high-pressure expanding hose.

Note: On Vickers power-steering pump VT 49 1st version, pay attention to disc (arrow).



2 Unscrew high-pressure expanding hose (29) on power steering pump with open box wrench element (072).



3 Connect high-pressure expanding hose (070a) of tester, as well as high pressure expanding hose (29) to tester (070). Fill reservoir with specified oil.

4 Run engine at idle speed and perform the following measurements:

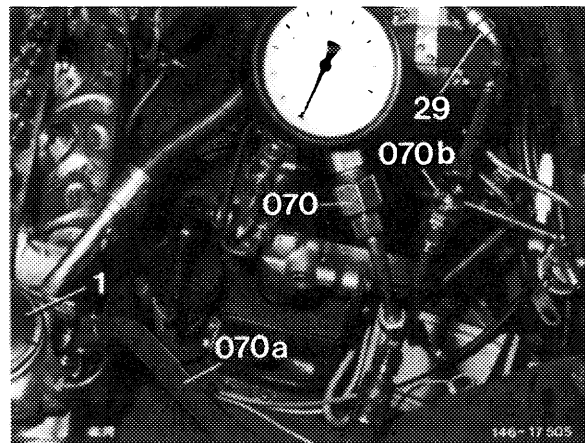
a) **with throttle valve opened, measure circulating pressure which should not exceed 5 bar gauge pressure (5 atü).** Do not move steering wheel when measuring, since this would activate the control valve and the pressure would increase.

b) **Close throttle valve on tester and measure max. pressure** of power steering pump, while accelerating engine to maintain a speed of approx. 1000/min.

The max. pressure can also be measured by turning the steering to left-hand and right-hand lock.

Caution, do not spend too much time for measuring, since this would cause the oil temperature to rise to non-permissible limits, which would in turn result in damage to power steering pump.

c) If the pump does not attain the specified pressure, check volume control valve and pressure relief valve and replace, if required.



5 Disconnect high-pressure expanding hose on tester, remove tester, connect high-pressure expanding hose to power steering pump. Tighten coupling screw to 45–50 Nm (4.5–5 kpm).

6 Fill supply tank with oil. Fill up with engine running.

Note: Oil level with oil at operating temperature (approx. 80 °C) up to punched-in or cast-in mark (approx. 20 mm below edge of tank).

Oil level with engine cold (ambient temperature) = 6–8 mm below mark.

7 Check servo system for leaks.

