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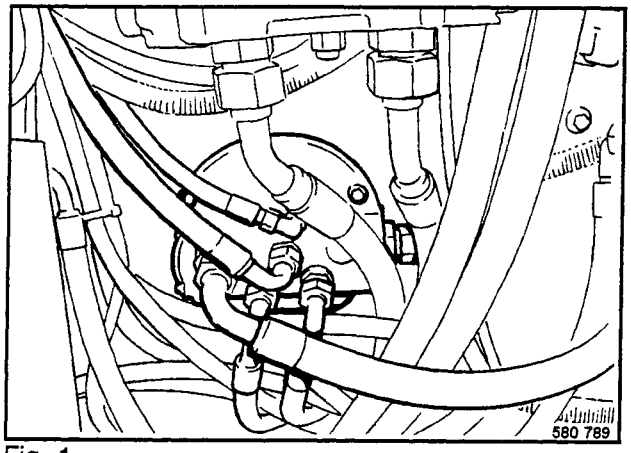


Fig. 1

2.14 Flushing the travel circuit

Cleaning the hydraulic oil tank

1. Pump the hydraulic oil with the filling and filtering unit out of the hydraulic oil tank into a clean vessel or into the oil bag.
2. Disconnect all hoses (Fig. 1) from the tank cover.
3. Unscrew the fastening screws from the cover and take the cover off.

Caution

Catch all hydraulic oil and dispose of environmentally!

4. Clean the inside of the hydraulic oil tank thoroughly, reinstall cover and hoses.

Filter installation for flushing the travel system

Caution

Before installing the flushing filter check all hoses and fittings of the flushing kit for cleanliness, clean if necessary.

1. Disconnect the high pressure hose (Fig. 2) from the travel pump.

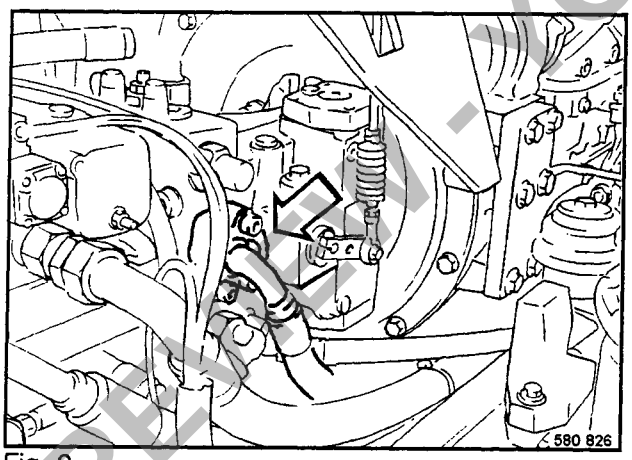


Fig. 2

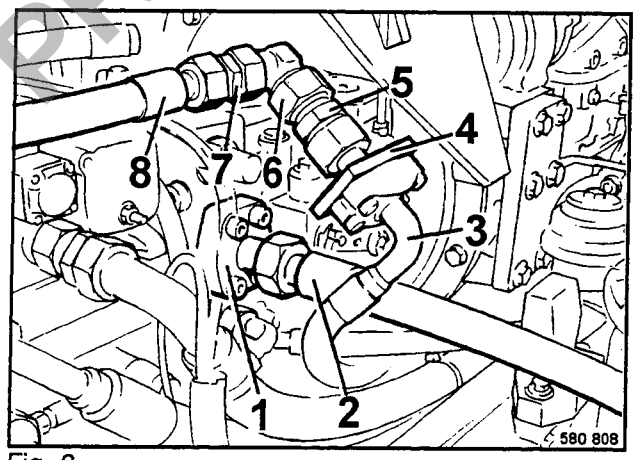


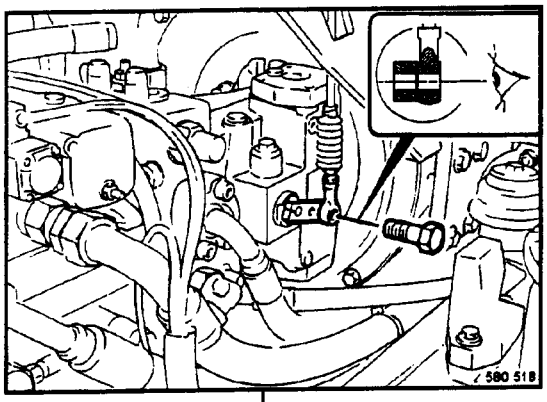
Fig. 3

2. Connect the flushing hose 2 (Fig. 3) from the filter outlet with an SAE - flange (1 to the travel pump.
3. Connect the flushing hose (8) from the filter inlet with a reducing fitting (7), an angular fitting (6), a connecting fitting (5) and a flange plate (4) to the disconnected high pressure hose (3).

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The machine drives with the travel lever in „NEUTRAL“

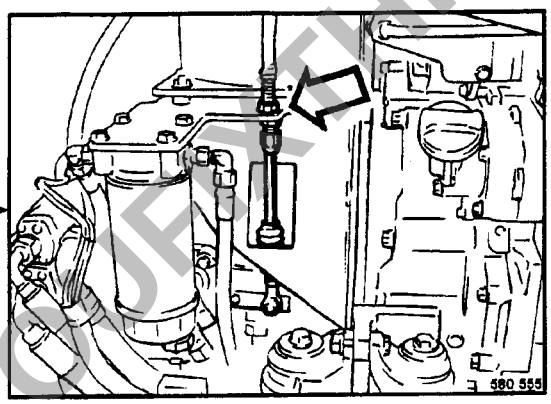


Check the neutral position

- Set the travel lever to "neutral"
- Detach the travel cable from the pump
- Check whether bores in ball joint and control lever are in line

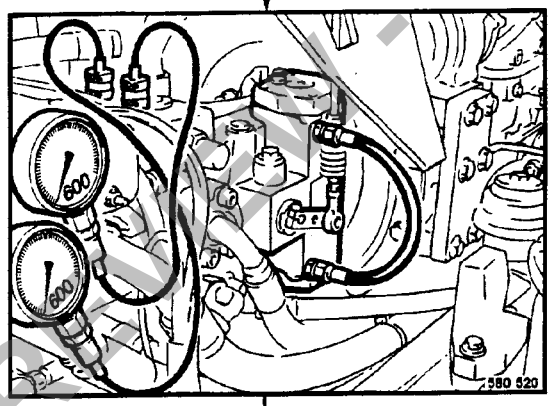
Bores are in line?

no



Adjust the travel cable

yes



Check the mechanical neutral position

- Connect both control chambers with a hose
- Connect 600 bar pressure gauges to the high pressure test ports
- Pull the plug off the brake solenoid valve
- Block drum and wheels with suitable chocks
- Run the diesel engine with max. speed
- Read the pressure gauges

Nominal value:
Equal pressure (charge pressure) on both pressure gauges

Neutral position OK?

no*

yes*

***Stop - inform the service department of BOMAG!**

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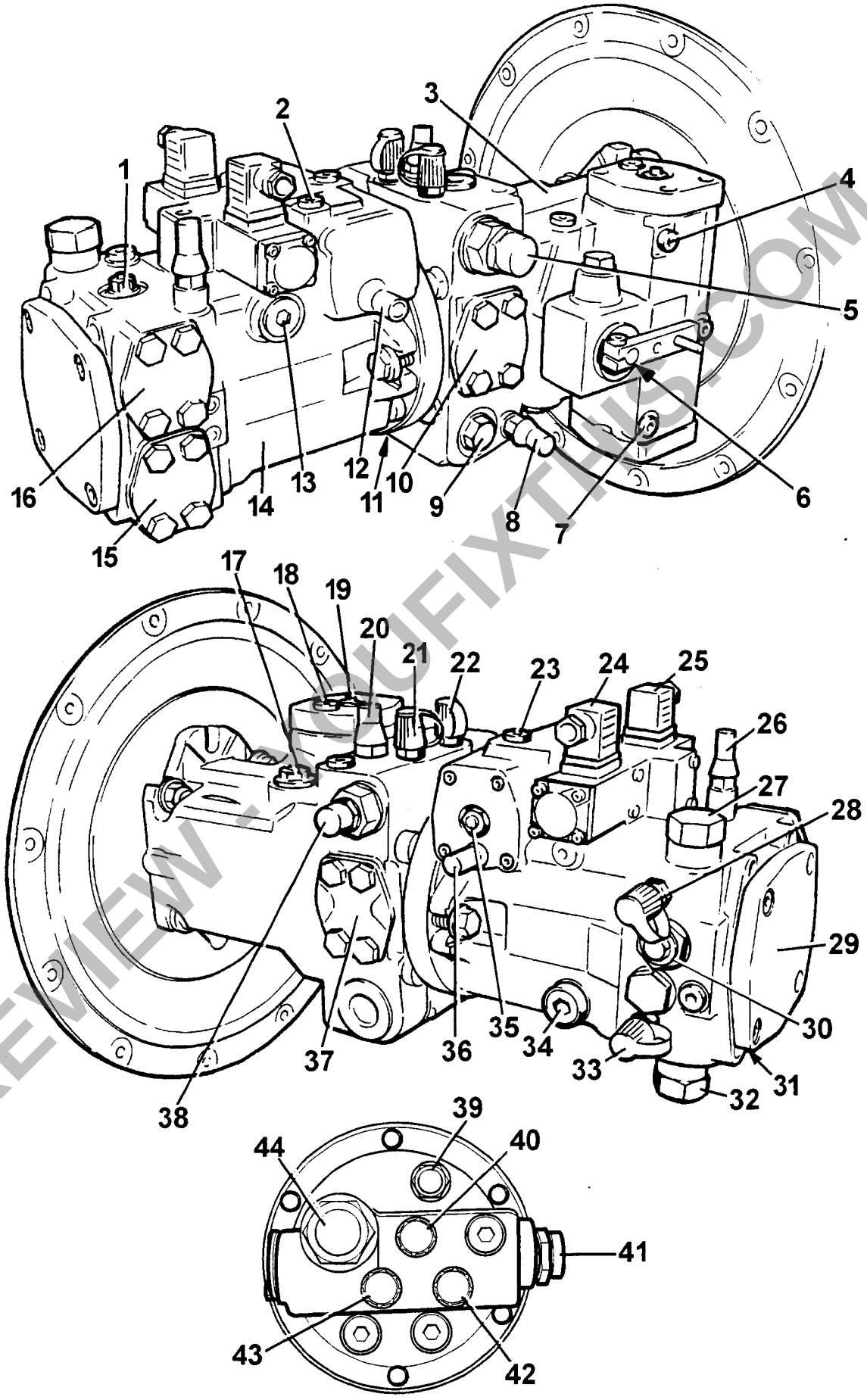
Torques for bolts with metric unified threads

Dimension of bolt	Torques Nm* (ft-lb)		
	8.8	10.9	12.9
M4	3 (2)	5 (3)	5 (4)

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1.01 Foreword

1.02 Safety regulations

1.03 General notes for repairs

1.04 Tightening torques

1.05 Connecting plan

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These safety regulations must be read and applied by every person involved in the repair of the machine. All applicable accident prevention instructions and the safety regulations in the operation and maintenance manual must also be observed.

Repairs must only be carried out by trained personnel or the BOMAG After Sales Service respectively.

Note

These repair instructions contain headers such as "Note", "Attention", "Danger" which must be strictly followed.

Note

This "Note" on repairs must be strictly followed.

Caution

This note "Attention" refers to repair procedures which must be strictly followed to avoid damge to the machine and other property.

Danger

This note "Danger" refers to repair procedures which must be strictly followed to avoid danger to life.

General

- Park the machine on firm and level ground to carry out repairs.
- Secure the machine against unintended rolling.
- Secure the engine reliably against unintended starting.
- Mark a defective machine by hanging a warning tag on the steering wheel.
- Secure the articulated joint by means of the articulated joint lock.
- Wear your protective outfit such as hard hat and safety boots.
- Keep unauthorized persons away from the machine while repair work is under progress.
- Tools, lifting devices, lifting tackle, supports and other devices must be reliable and safe to operate.
- Use only secure lifting devices of sufficient capacity for removing and installing components.
- Take care when using cleasing agents. Petrol or other easily inflammable substances must never be used for cleaning purposes.
- Cleaning and repairing the fuel tank is very dangerous. When cleaning or repairing a tank do not smoke in the vicinity of the tank and avoid sparks and any kind of fire.
- Always observe the welding instructions when carrying out welding work.

Special safety notes

- Use only genuine BOMAG spare parts.
- Genuine parts and accessories are especially designed for the machine.
- We wish to make expressly clear that we have not tested or authorized any genuine parts or special equipment not supplied by us. The installation or use of such products can therefore have an adverse effect on specified design characteristics and/or passive driving safety. The manufacturer expressly excludes any liability for damage resulting from the use of non-genuine parts or accessories.
- Do not make any conversions or changes to the machine, since this may impair the safety.
- Keep away from the machine's articulation area if tests need to be carried out while the engine is running. Danger of accident!
- Do not clean the machine while the engine is running.
- Do not come in contact with rotating parts of the engine. Danger of accident!
- Exhaust gases are extremely dangerous. Ensure an adequate supply of fresh air when starting the engine in closed rooms.
- Fill in fuel when the engine is stopped! Ensure cleanliness! Do not spill any fuel!
- Store used filters in a special container and dispose of environmentally.
- During maintenance work collect all oils and fuels and dispose of environmentally.
- Do not fill the tank in closed rooms.
- There is a danger of scalding when working with hot oil.
- Do not heat up oil over 160°C, as otherwise the oil or oil vapour may ignite.
- Wipe off any spilled fuel and oils.
- Do not smoke when refuelig or checking the acid level in the battery.
- Never check the acid level in the battery and the fuel level with a naked flame.
- Dispose of used batteries environmentally.

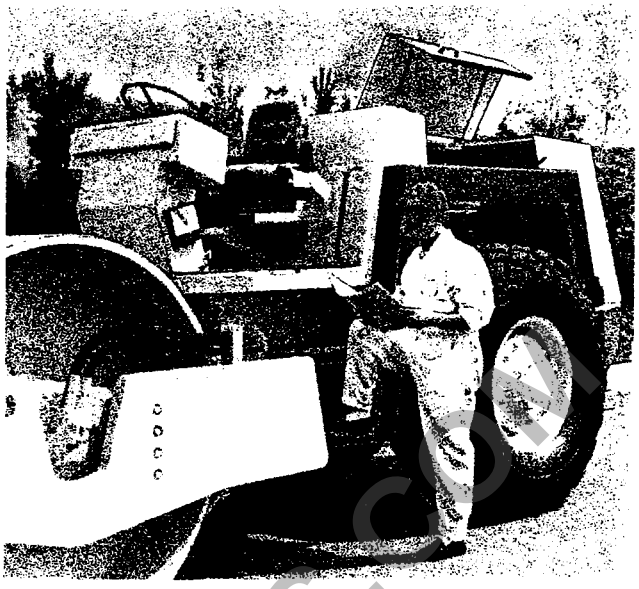
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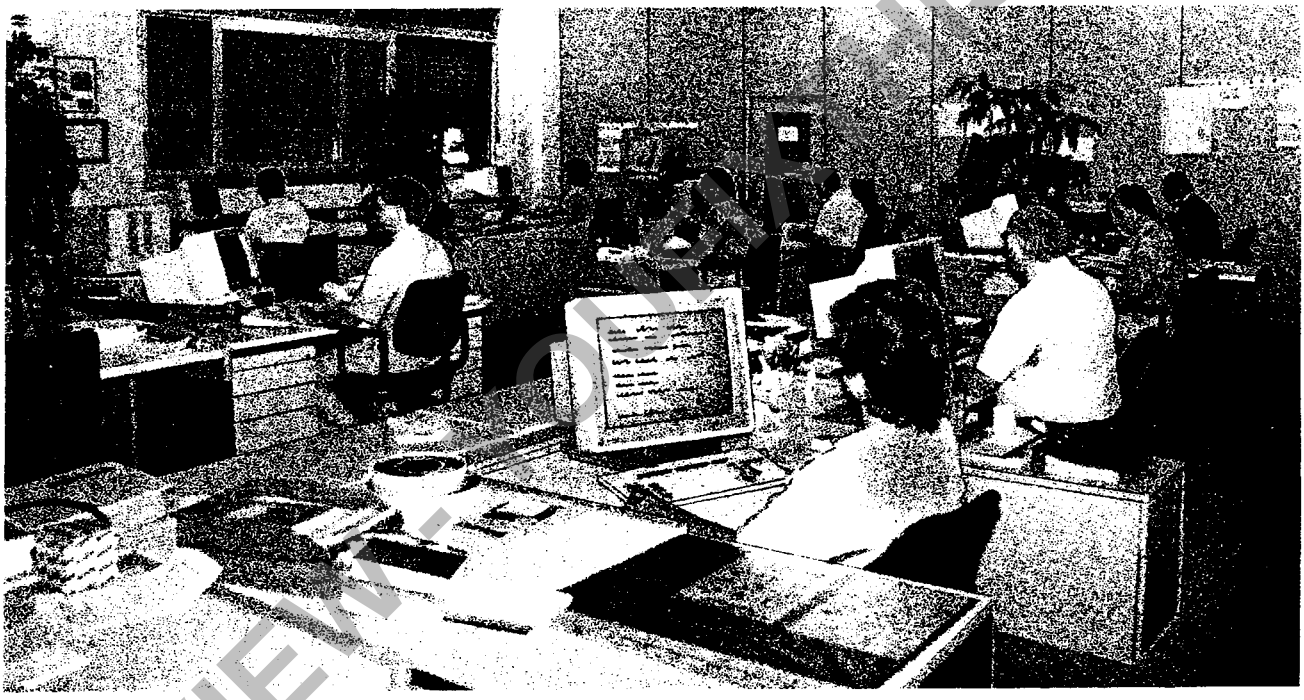
BOMAG

Practical information - for the user!

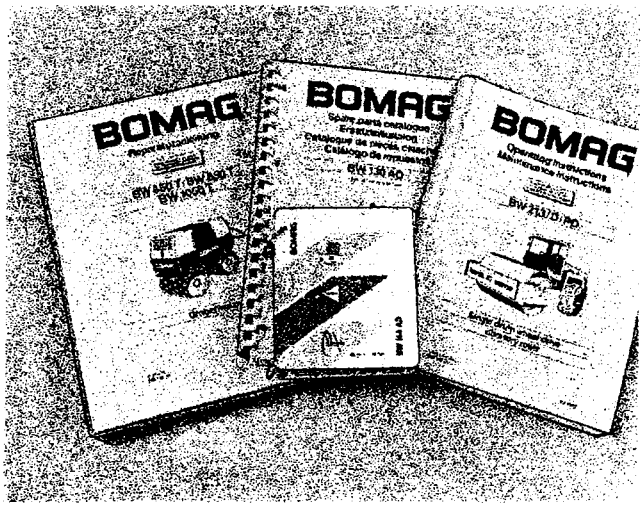
Efficient operation of your machine is ensured by using the operating, maintenance, repair and spare parts manuals.



Thought out by specialists . . .



. . . electronically processed . . .



All in all, advanced technical documentation that makes a good product even better.

an advantage for the user.

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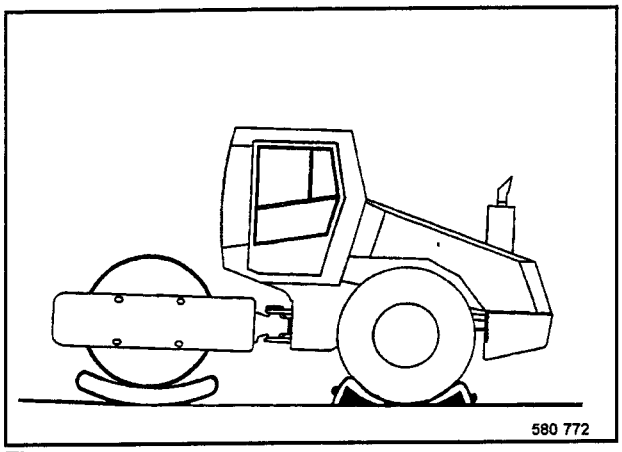


Fig. 1

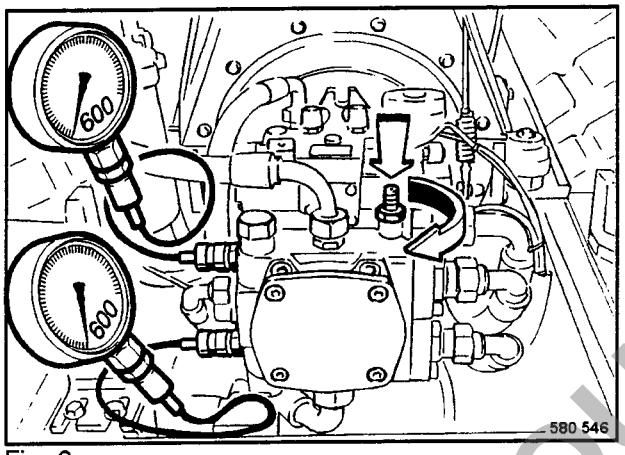


Fig. 2

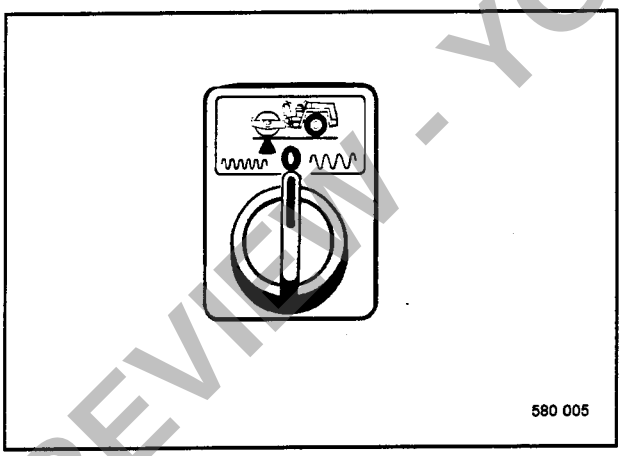


Fig. 3

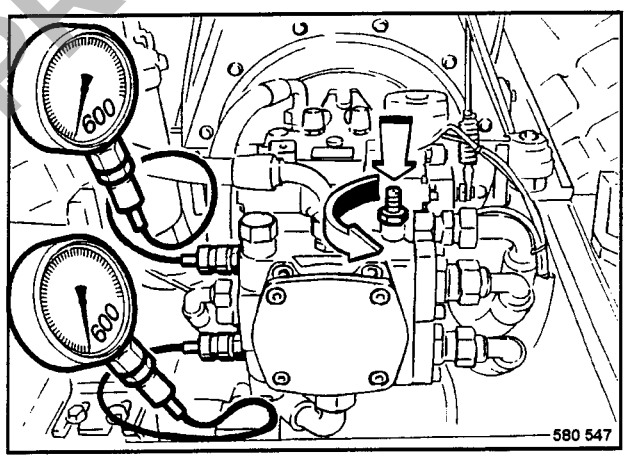


Fig. 4

2.09 Adjusting the high pressure relief valves in the vibration system

Caution

Measurements should be performed at operating temperature of the hydraulic oil (approx.40 ¬C).

1. Drive the machine with drum onto a soft base (rubber tires), apply the parking brake and and block the wheels additionally with chocks(Fig. 1).

2. Connect 600 bar pressure gauges to the high pressure test ports MA and MB (Fig. 2).

3. Turn the adjustment screw of the pressure override valve completely in to block the valve.

4. Start the engine and shift the throttle lever to max. engine speed position.

5. Switch the vibration on with high or low frequency (Fig. 3) and read the pressure gauges.

   Nominal value:
   Starting pressure 385 bar

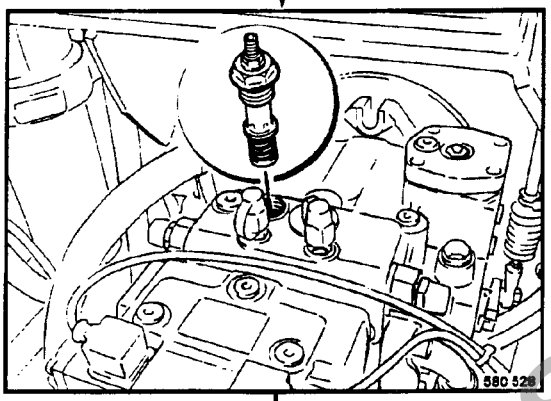
   Evaluation of test:
   If the nominal value is only reached in one frequency, clean the valve, replace or adjust it. If the nominal value is not reached with both frequencies, check the vibration pump and replace it if necessary.

Adjusting the pressure override

1. Turn the adjustment screw (Fig. 4) out until the pressure is limited to 365 bar.

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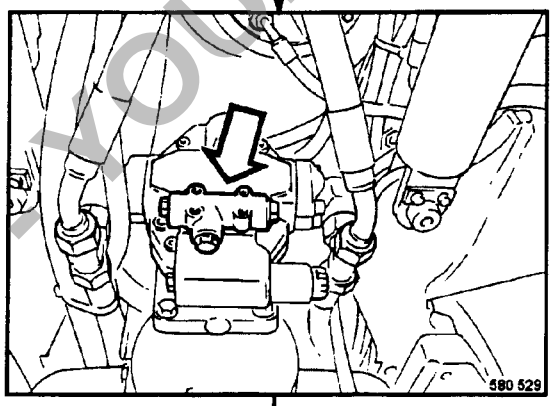
Check the charge pressure relief valve

Valve OK?

no

Replace the charge pressure relief valve

yes



Check the flushing valve on the axle drive motor

Flushing valve OK?

no

Replace the flushing valve

yes

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1 Drum
2 Cylinder roller bearing
3 Coupling
4 Vibration motor
5 Cover
6 Grooved ball bearing
7 Spacer block
8 Rectangular rubber element
9 Side plate
10 Spacer ring
11 Grooved ball bearing
12 Mechanical seal
13 Flanged hub
14 Vibrator shaft
15 Coupling
16 Vibrator shaft
17 Change-over weight
18 Cylinder roller bearing
19 Basic weight
20 Flanged housing
21 Flange
22 Cylinder roller bearing
23 Cover

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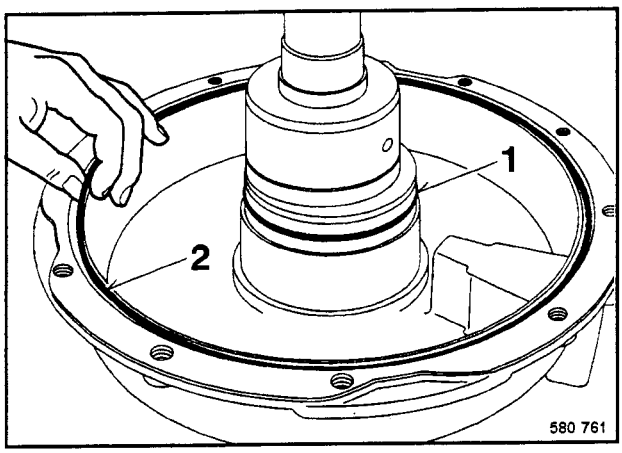


Fig. 5

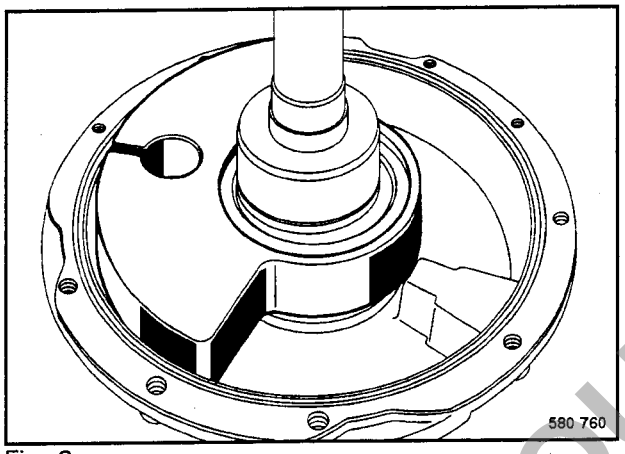


Fig. 6

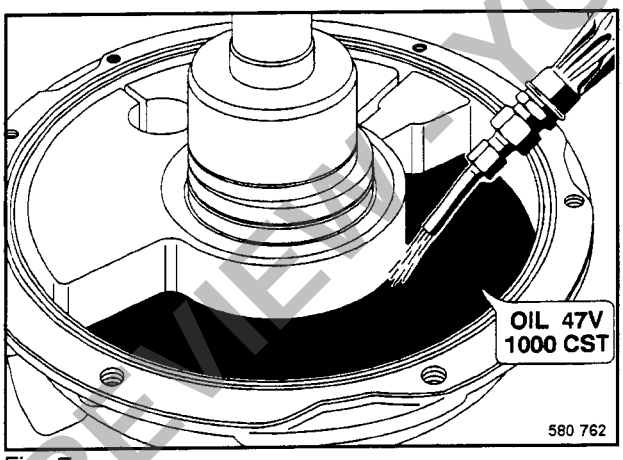


Fig. 7

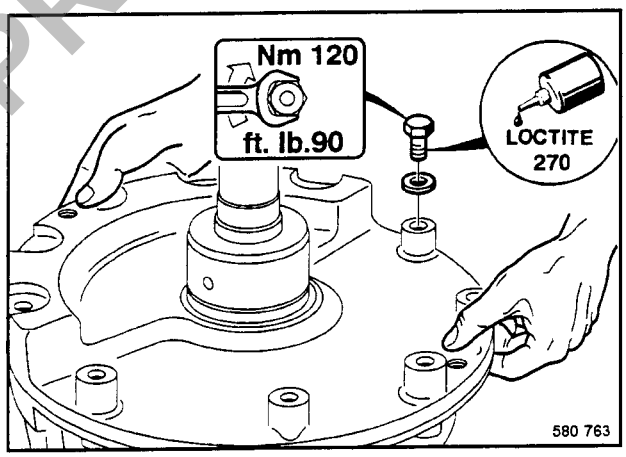


Fig. 8

Assembling the change-over weight

1. Insert the new O-rings 1 and 2 (Fig. 5) with grease.

2. Place the change-over weight into the basic weight (Fig. 6).

3. Fill approx. 2,5 litres of silicone oil 47 V 1000 cst (up to the upper edge of the change-over weight) into the basic weight (Fig. 7).

4. Lay the cover on (Fig. 8), so that the raised areas are in line.

5. Screw the screws in with screw locking agent (e.g. Loctite green 270) and tighten them with 120 Nm.

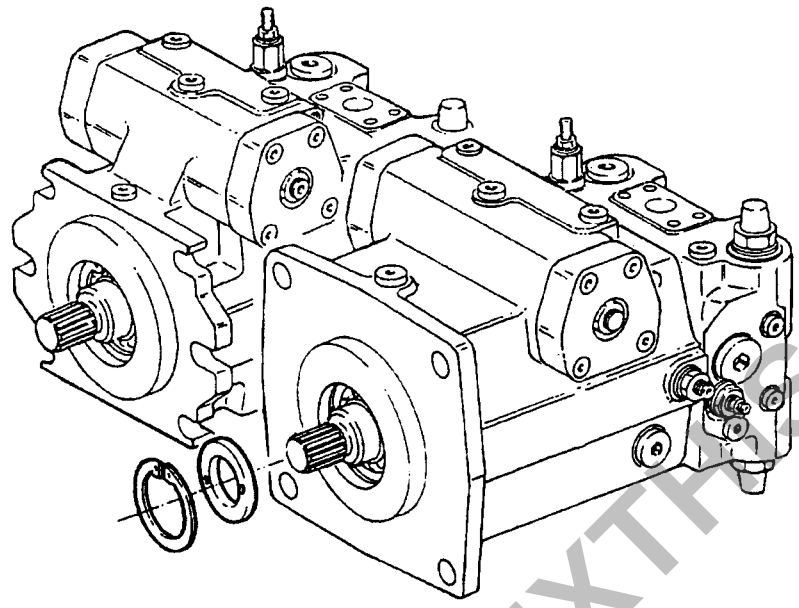
6. Check the axial clearance of the shaft.

Note

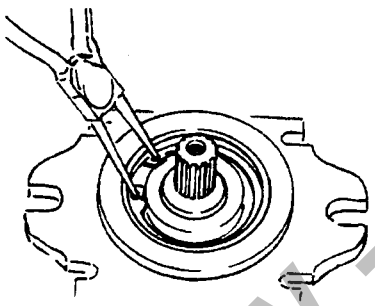
The shaft must have clearance.

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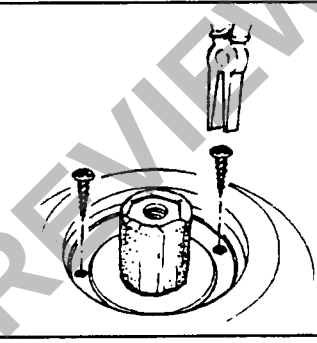


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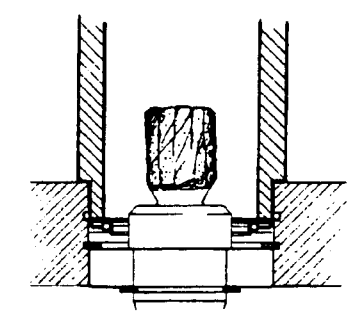
14 Triebwelle abkleben.
Sicherungsring ausbauen.

Protecting the drive shaft.
Remove retaining ring.



15 Blechschraube in die mit Gummi gefüllten Löcher eindrehen.
Mit Zange WDR herausziehen.

Screw in sheet metal screw into the holes fitted with rubber.
Pull out shaft seal with pliers.

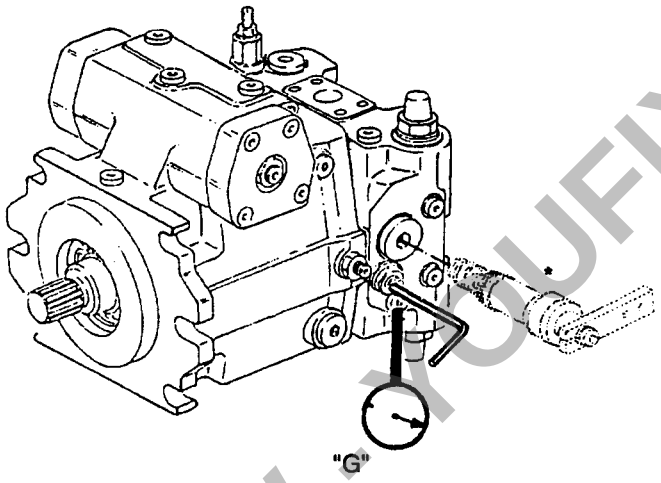


16 Wellendichtring mit Buchse auf Anschlag einpressen.
Sicherungsring einbauen.

Press-in shaft seal with bush to stop.
Assemble retaining ring.

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Achtung!
Sicherheitsbestimmungen beachten!

Hinweis:
Nachjustierung nur bei Betriebstemperatur.

Manometer an "G" anschließen.

Achtung!
* Speisedruckeinstellung!
Nenndruck p_H - 18 bar
Höchstdruck p_H - 40 bar
Bei Max.-Drehzahl.

Hinweis:
Einstelldaten nach Werksauftrag.

* bei DA-Ausführung

Attention!
Observe safety regulations!

Note:
Readjusting only at operating temperature.

Connect manometer to "G".

Attention!
* Boost pressure setting!
Nominal pressure p_H - 18 bar
Peak pressure p_H - 40 bar
at max. speed.

Note:
Adjusting data according to order.

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SPRING APPLY CYLINDER (FAIL-SAFE BRAKE)

1. Assemble cylinder over pullrod.
2. Install bracket and U-bolt assembly over studs, and tighten nut.
3. Apply 160–200 psi hydraulic pressure to pressure port to compress the spring.
4. Install the conical nut, and tighten to approximately 50 in-lb (5.6 N·m) so that the brake has locked.
5. Back nut off eight flats.
6. Release hydraulic pressure.
7. Install prevailing torque nut, and tighten until it contacts the conical nut.
8. Apply pressure to port again, and confirm that axle shaft rotates freely. Install spring and nut with square head in end of cylinder.

NOTE: All of the cylinders mentioned in this section should be filled with mineral brake fluid (e.g., NH ESN-M6C59-A).

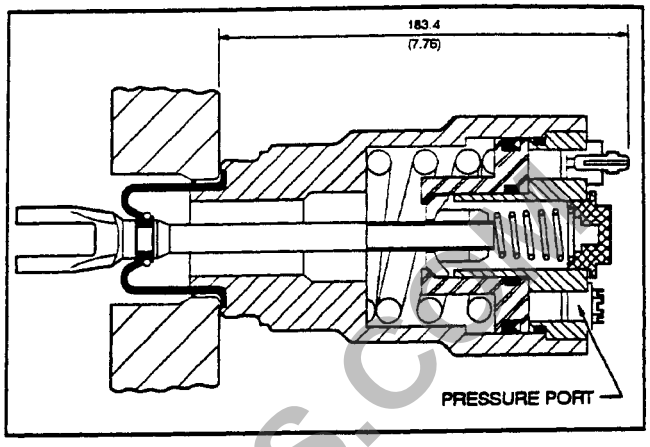


Figure 28

Spring Apply—Mico

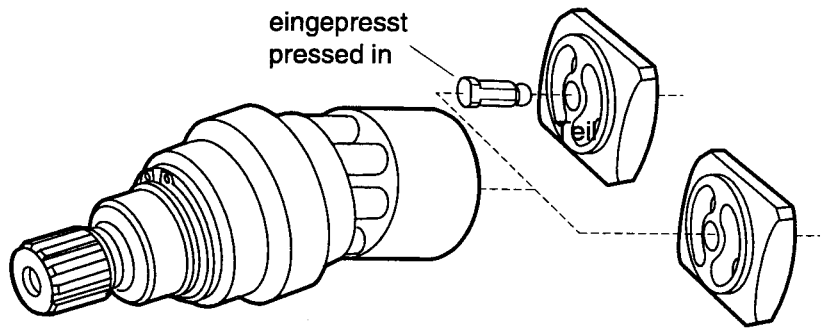
MECHANICAL BRAKES

With vehicle lifted off the ground, adjust mechanical brakes as follows:

1. Connect pullrod to linkage in customer vehicle.
2. Tighten nut until brakes lock.
3. Back off nut eight flats.
4. Tighten jam nut to 20–25 ft-lb (27–34 N·m).
5. Check to see that braking starts to occur when pedal is pressed 1.25″–1.75″ (32–44 mm).

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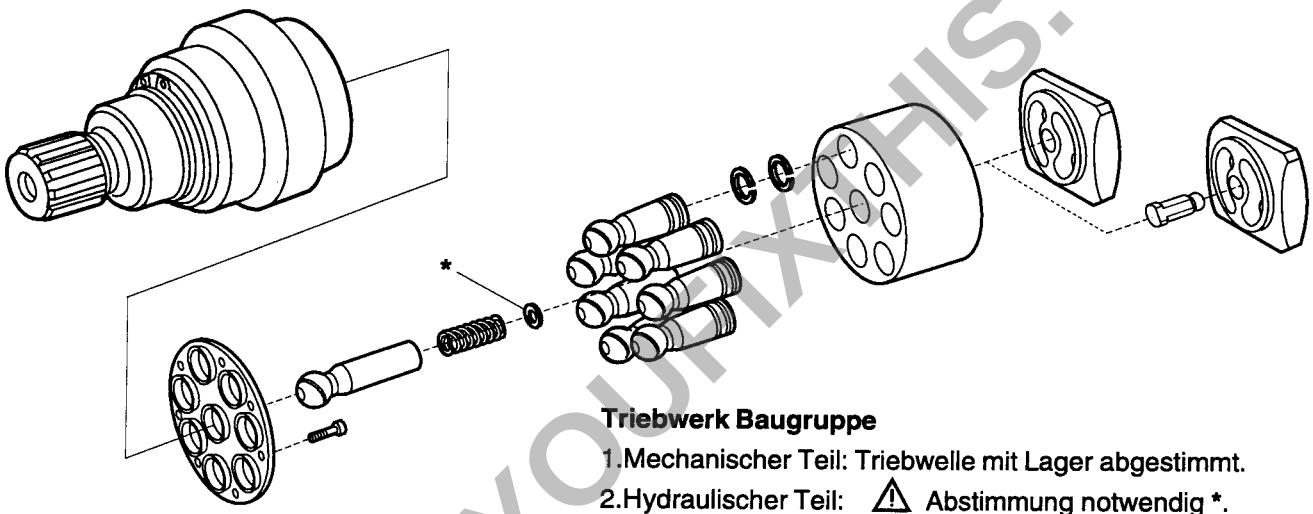


Triebwerk komplett

⚠ Abstimmung hydraulischer Teil notwendig.

Complete rotary group

⚠ Setting of hydraulic part necessary. 40



Triebwerk Baugruppe

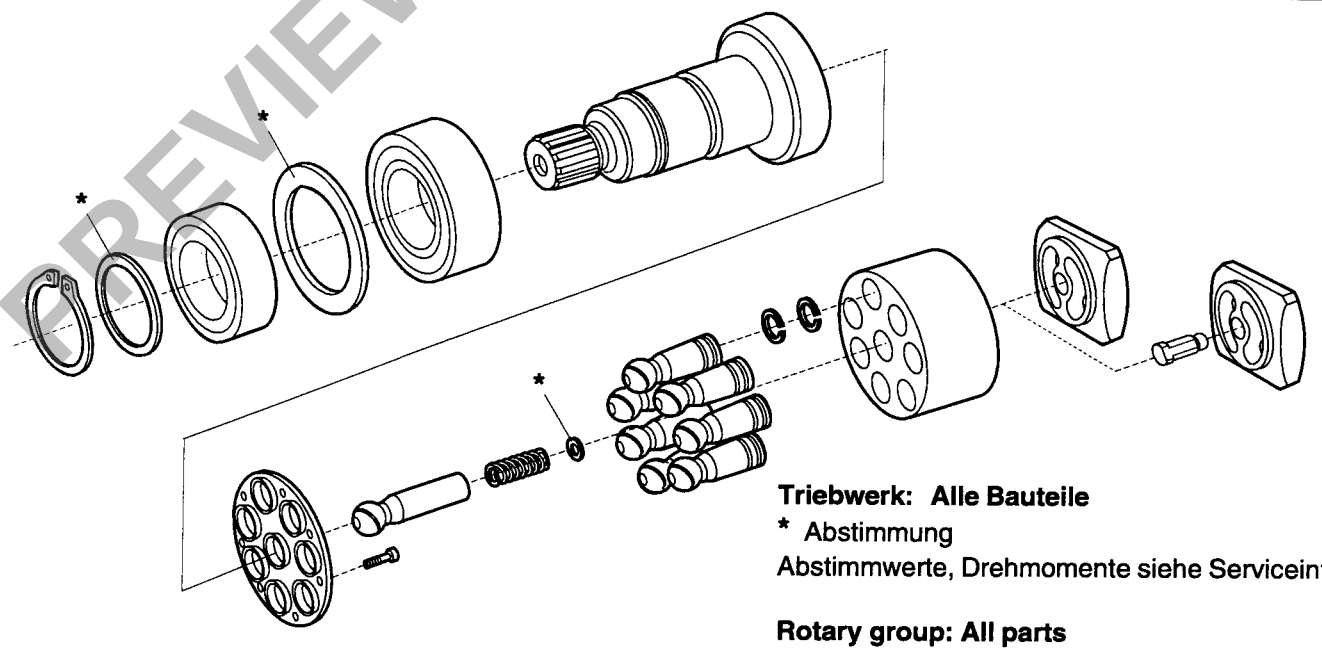
1.Mechanischer Teil: Triebwelle mit Lager abgestimmt.

2.Hydraulischer Teil: ⚠ Abstimmung notwendig *.

Rotary group

1. Mechanical part: Adjust drive shaft with bearing.

2. Hydraulic part: ⚠ Adjustment necessary 41



Triebwerk: Alle Bauteile

* Abstimmung

Abstimmwerte, Drehmomente siehe Serviceinfo.

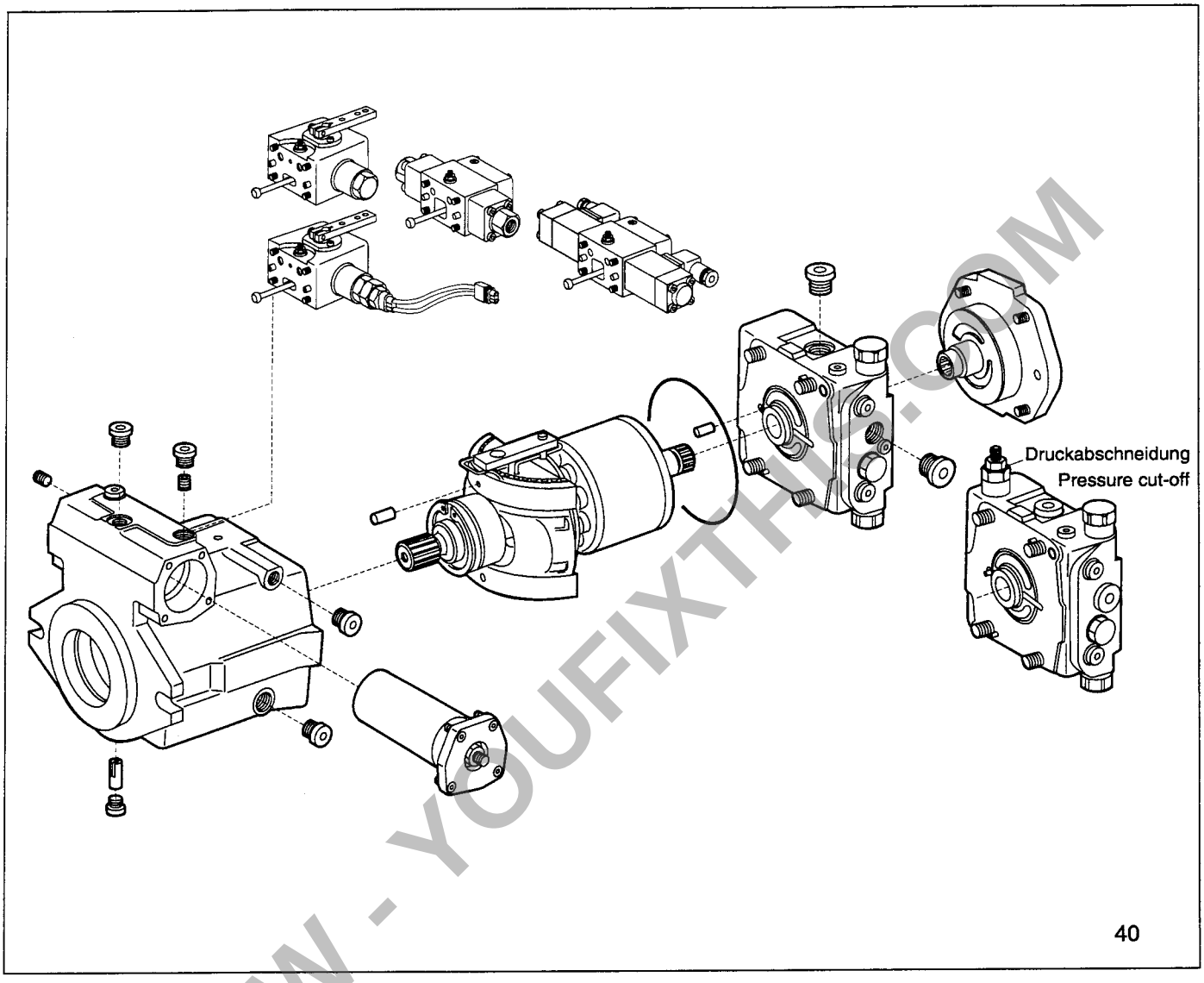
Rotary group: All parts

* Setting

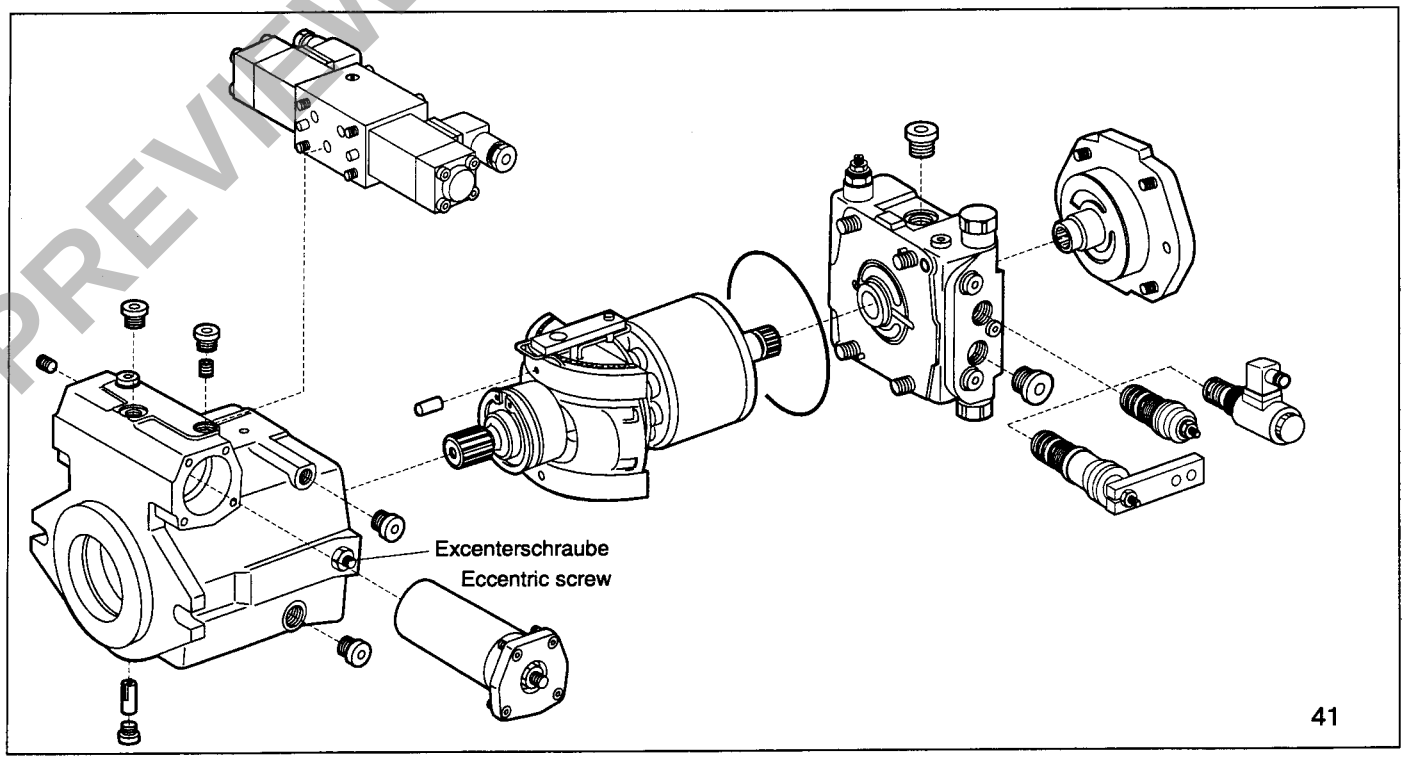
Setting value, torque see service information. 42

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