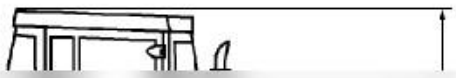
Technical Data







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1 Travel lever
2 Steering wheel
3 not used
4 Tire pressure gauge
5 Emergency stop push button
6 Rotary switch for hazard light system
7 Instrument cluster
8 Speedometer*
9 not used
10 Push button for heating flange control*
11 Rotary switch for travel ranges
12 Rotary switch, dashboard illumination
13 Rotary switch for pressure sprinkler system
14 Warning light, brake temperature
15 Rotary switch for parking brake
16 Warning light, brake pressure
17 Push button for warning horn
18 Rotary switch for direction indicators left / right
19 Rotary switch for light system (StVZO)
20 Rotary switch for working lights
21 Throttle pedal
22 Ignition switch
23 Brake pedal
24 Rotary switch for tire inflation
25 Rotary switch to relieve tire pressure
26 Utility socket 12 V

* Optional equipment

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4.4 Starting the engine

⚠ Danger

Danger of accident!

Always wear your seat belt.

Before starting make sure that no persons are within the danger zone.

Start the engine only from the operator's seat.

Before starting activate the parking brake and shift the travel lever to "neutral"-position.

Do not start the engine by towing the machine.

If the engine needs to be started with jump wires, connect terminals (+) with (+) on battery and (-) with (-) ground on engine block.

When starting with jump wires always connect the ground cable (negative) first and disconnect it last.

Never disconnect a battery cable while the engine is running.

Do not allow the engine to run longer than 10 minutes with idle speed (1500 rpm).

Do not load the engine to its limits before the operating temperature is reached.

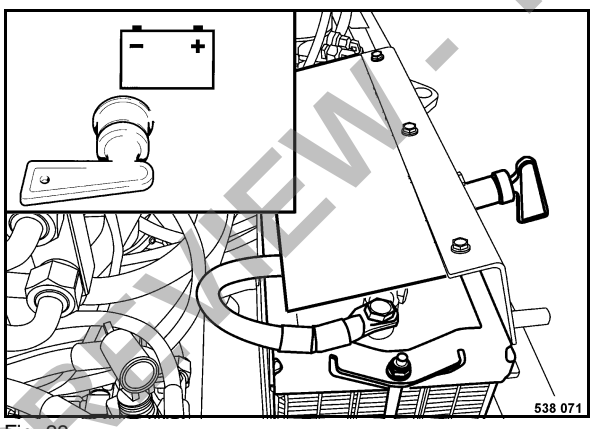


Fig. 38

- Switch the main battery switch (Fig. 38) to position "On".

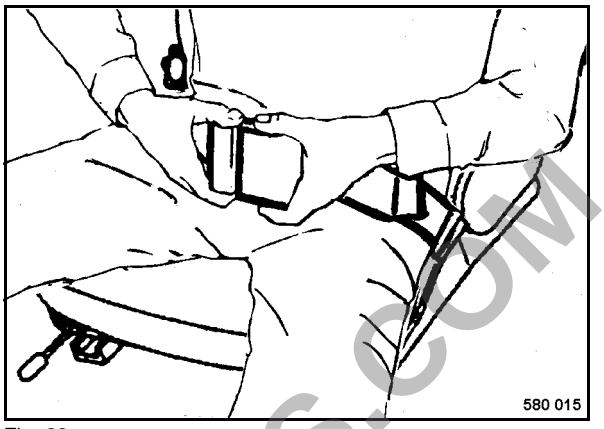


Fig. 39

- Fasten your seat belt (Fig. 39).

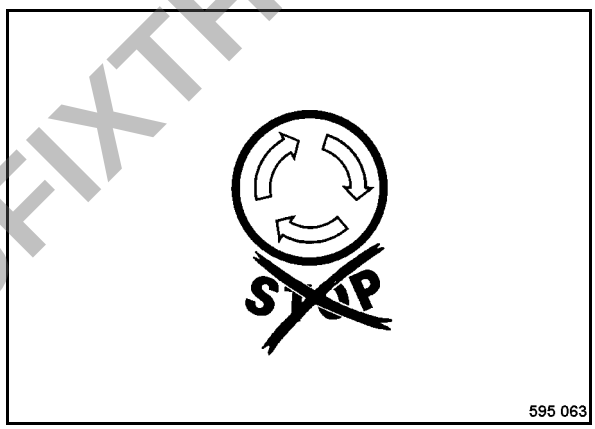


Fig. 40

- Check, whether the emergency stop switch (Fig. 40) is unlocked, unlock if necessary.

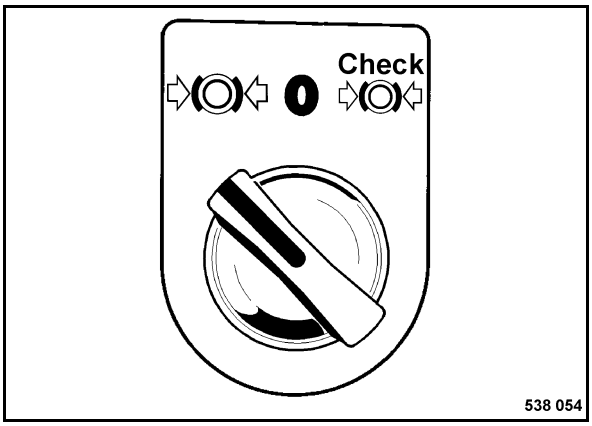


Fig. 41

- Check whether the parking brake is activated, if necessary activate the parking brake (Fig. 41).

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5.1 General notes on maintenance

When performing maintenance work always comply with the appropriate safety regulations.

Thorough maintenance of the machine guarantees far longer safe functioning of the machine and prolongs the lifetime of important components. The effort needed for this work is only little compared with the problems that may arise when not observing this rule.

The terms right/left correspond with travel direction forward.

- Always clean machine and engine thoroughly before starting maintenance work.
- For maintenance work stand the machine on level ground.
- Perform maintenance work only with the engine shut down.
- Relieve hydraulic pressures before working on hydraulic lines.
- Before working on electric parts of the machine disconnect the battery and cover it with insulation material.

Environment

During maintenance work catch all oils and fuels and do not let them seep into the ground or into the sewage system. Dispose of oils, coolant and fuels environmentally.

Notes on the fuel system

The lifetime of the diesel engine depends to a great extent on the cleanliness of the fuel.

- Keep fuel free of contaminants and water, since this will damage the injection elements of the engine.
- Drums with inside zinc lining are not suitable to store fuel.
- The fuel drum must rest for a longer period of time before drawing off fuel.
- Do not let the hose stir up the slurry at the bottom of the drum.
- Do not draw off fuel from near the bottom of the drum.
- The rest in the drum is not suitable for the engine and should only be used for cleaning purposes.

Notes on the performance of the engine

On diesel engines both combustion air and fuel injection quantities are thoroughly adapted to each other and determine power, temperature level and exhaust gas quality of the engine.

If your engine has to work permanently in "thin air" (at higher altitudes) and under full load, you should consult the customer service of BOMAG or the customer service of the engine manufacturer.

Notes on the hydraulic system

During maintenance work on the hydraulic system cleanliness is of major importance. Make sure that no dirt or other contaminating substances can enter into the system. Small particles can produce flutes in valves, cause pumps to seize, clog nozzles and pilot bores, thereby making expensive repairs inevitable.

- If, during the daily inspection of the oil level the hydraulic oil level is found to have dropped, check all lines, hoses and components for leaks.
- Seal external leaks immediately. If necessary inform the responsible customer service.
- Do not store drums with hydraulic oil outdoors, or at least under a cover. Water can be drawn in through the bunghole when the weather changes.
- Always use the filling and filtering unit (BOMAG part-no. 007 610 01) to fill the hydraulic system. This unit is fitted with a fine filter to clean the hydraulic oil, thereby prolonging the lifetime of the filter.
- Clean fittings, filler covers and the area around such parts before disassembly to avoid entering of dirt.
- Do not leave the tank opening unnecessarily open, but cover it so that nothing can fall in.

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6.2 Engine

Faults	Possible cause	Remedy
The engine does not start	Starter defective or pinion not engaging	Have examined by a specialist
	Fuel tank empty	Fill and bleed the tank
	Temperature below starting limit	Use winter fuel and engine oil acc. to the ambient temperature.
	Fuel filter clogged, in winter due to paraffin separation.	Change the filter. use winter fuel
	Fuel lines leaking	Check all line connections for leakages and tighten the fittings.
	Battery discharged or not connected	Tighten the pole clamps, check the cable connections
	Injection valves or injection pump defective	Have examined by a specialist
The engine starts poorly and works irregularly with poor power	Battery power too low, battery clamps loose or oxidized, causing the starter to turn too slowly	Have the battery checked, clean the terminal clamps, tighten them and cover them with acid free grease
	Especially during winter: the use of too viscous engine oil	Use engine oil suitable for the ambient temperature
	Fuel supply restricted, in winter fuel system clogged due to paraffin separation	Change the fuel filter. Check the line connections for leaks and tighten the fittings. Use winter fuel in the cold season.
	Incorrect valve clearance	Adjust the valve clearance
	Injection valve defective	Have examined by a specialist
	Injection lines leaking	Check the lines for leakages
	Turbo charger defective	Have examined by a specialist
	Dry air filter dirty	clean, replace if necessary
	Excessive play in the throttle cable	Adjust the throttle cable, change it if necessary

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General

This BOMAG machine is built in accordance with the latest technical standard and the valid technical rules and regulations. There is, however, a risk of danger for persons and property if:

- the machine is used for purposes other than those it is intended for
- the machine is operated by untrained personnel
- the machine is modified or converted in an unprofessional way
- the applicable safety regulations are not observed.

Each person involved in operation, maintenance and repair of the machine must therefore read and apply these safety regulations. This should be confirmed by obtaining the signatures of the customer, if necessary.

Furthermore the following regulations and instructions are obviously also valid:

- applicable accident prevention instructions
- generally acknowledged safety and road traffic regulations
- country specific safety regulations. It is the duty of the operator to know and observe these regulations. This applies also for local regulations and the regulations for various types of manual work. If the recommendations in this manual differ from the regulations valid in your country, you must strictly observe the regulations in your country.

Intended use

This machine must only be used for:

- Compaction of bituminous material, e.g. road surface layers,
- light compaction work in earth construction (road sub-bases).

Unintended use

However, dangers may arise from this machine if it is operated by untrained personnel or if it is subjected of unintended use.

Starting and operation of the machine in explosive environments is prohibited.

Who is allowed to work with the machine?

The machine must only be operated by trained and authorized persons which are at least 18 years of age. The responsibilities for the operation of the machine must be clearly specified and complied with.

Persons under the influence of alcohol, medication or drugs must not operate, service or repair the machine.

Maintenance and repair tasks require specific knowledge and must therefore only be carried out by trained and qualified personnel.

Conversions and alterations to the machine

Unauthorized conversions to the machine are prohibited for safety reasons.

Original parts and accessories have been specially designed for this machine. We wish to make expressly clear that we have not tested or authorized any original parts or special equipment not supplied by us. The installation and/or use of such products can impair the active and/or passive driving safety. The manufacturer expressly excludes any liability for damage resulting from the use of non-original parts or accessories.

Safety notes in the operating and maintenance instructions:

⚠ Danger

Sections marked like this point out possible dangers for persons.

⚠ Caution

Sections marked like this point out possible dangers for the machine or for parts of the machine.

i Note

Sections marked like this provide technical information concerning the optimal economical use of the machine.

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Please fill in

. . . . . .

Machine type(Fig. 1)

. . . . . .

Serial number (Fig. 1)

. . . . . .

Engine type(Fig. 2)

. . . . . .

Engine number (Fig. 2)

i Note

Supplement the above data together with the commissioning protocol.

During commissioning our organisation will instruct you in the operation and maintenance of the machine.

Please observe strictly the safety regulations and all notes on risks and dangers!

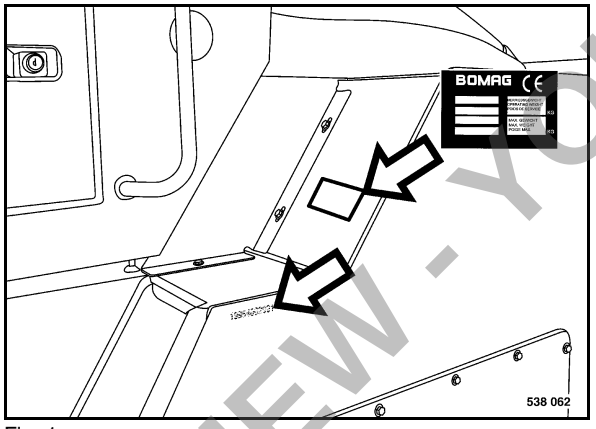


Fig. 1

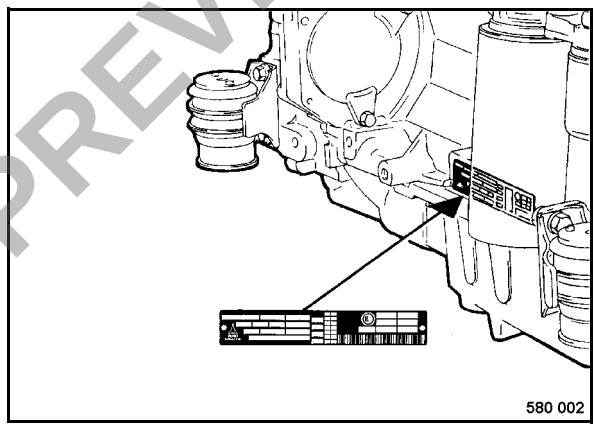


Fig. 2

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engine oil cooler and radiator, if necessary repair the engine

b red = flashes if engine oil pressure is too low, the warning buzzer sounds, the engine is shut down after 10 seconds. Check the engine oil level, if necessary have the engine repaired.

c yellow = Engine air filter, lights if air filter cartridge is soiled, clean or replace if necessary.

d yellow = Charge control light, lights if battery is not being charged.
Check V-belt, if necessary repair the generator

e yellow = lights when the hydraulic oil filter is exhausted, check the hydraulic system, replace the hydraulic oil filter

f yellow = not active

g red = lights when the parking brake is applied

h green = Direction indicator, flashes when the travel direction switch is actuated.

i yellow = Water separator in fuel pre-cleaner. Lights when the amount of water in the transparent section of the fuel filter reaches the contacts.

j red = flashes when the coolant (filling) level is too low, the warning buzzer sounds.

k yellow = Pre-heating and after-heating*

l red = Hazard light, flashes when the hazard light is activated

m = Operating hour meter, counts the operating hours while the engine is running. All maintenance work must be performed according to the indicated operating hours.

n = Fuel tank filling level
When falling below the lowest filling level the last green LED will light and the red LED will additionally come on.
When the fuel tank is empty only the red LED will flash.

i Note

Nine green and one red LED.

* Optional equipment

When falling below the lowest filling level the last green LED will light and the red LED will additionally come on.

When the fuel tank is empty only the red LED will flash.

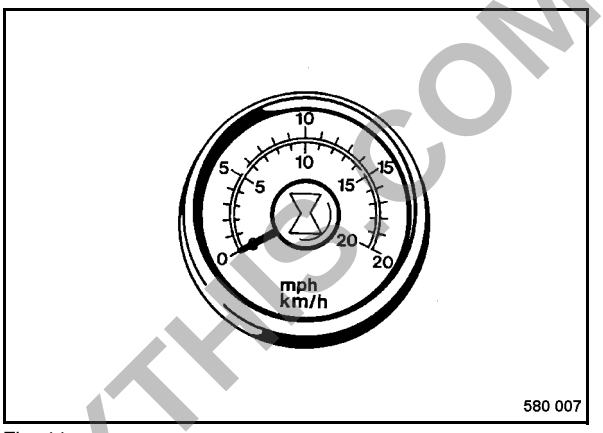


Fig. 11

No. 8 = Speedometer*

Shows the travel speed of the machine.

black display
scale = km/h

red display
scale = M.P.H.

No. 9 = not used

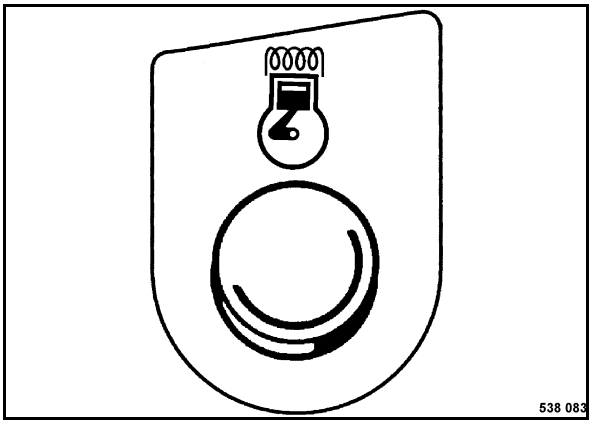


Fig. 12

No. 10 = Push button for heating flange**

The heating flange has the function of heating up the combustion air under cold ambient temperatures. The high heating up of the combustion air improves the cold starting characteristics and the exhaust emissions (white smoke) of the diesel engine. The pre-heating time is only started at tem-

** Optional equipment

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4.10 Operating the pressure sprinkler system

⚠ Caution

Before driving with the wheels on fresh bituminous layers to be compacted, the wheels must be completely wetted.

Spray the rubber tires with a suitable anti-sticking agent.

For normal travel and compaction work in earth construction lift the scraper brushes* off and locke them.

- Check the water level, fill up if necessary.

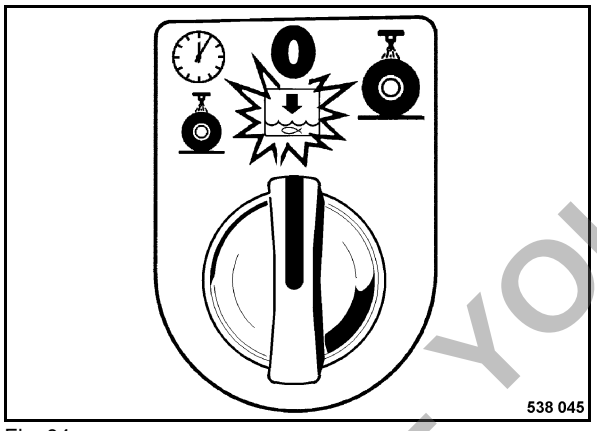


Fig. 64

- Turn the rotary switch (Fig. 64) to activate the sprinkler system.

* Optional equipment

4.11 Operating the tire inflation** system

i Note

Changing of the tire pressure is possible during operation. For correct tire pressure refer to the table at the ed of this manual.

⚠ Caution

Do not activate both switches (filling / emptying) at the same time

Filling the tires

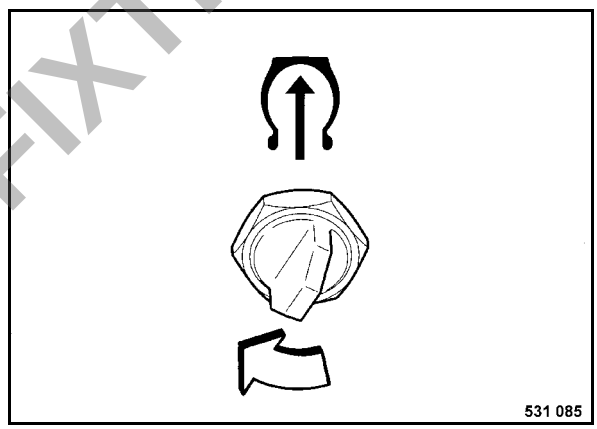


Fig. 65

- Turn the rotary switch (Fig. 65) clockwise.

The tires will be inflated, the pressure can be read on the pressure gauge in the dashboard.

** Optional equipment

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5.12 Checking/adjusting the scrapers

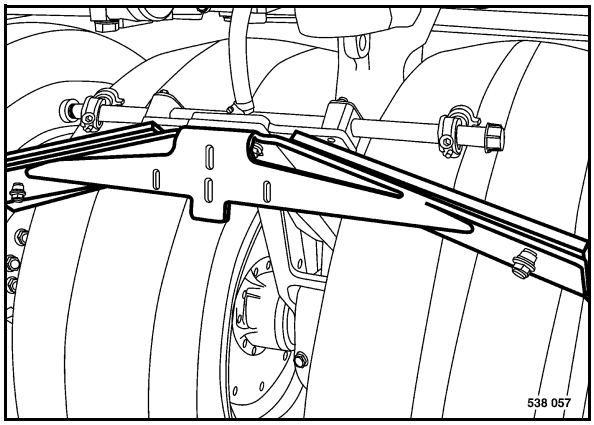


Fig. 84

- Check the condition of scrapers (Fig. 84) or scraper brushes*, if necessary adjust clearance or replace.

i Note

Clearance tires - scrapers: approx. 10 mm

* Optional equipment

5.13 Check the fuel level

⚠ Danger

Fire hazard!

When working on the fuel system do not use open fire, do not smoke, do not refuel in closed rooms, do not inhale any fuel fumes.

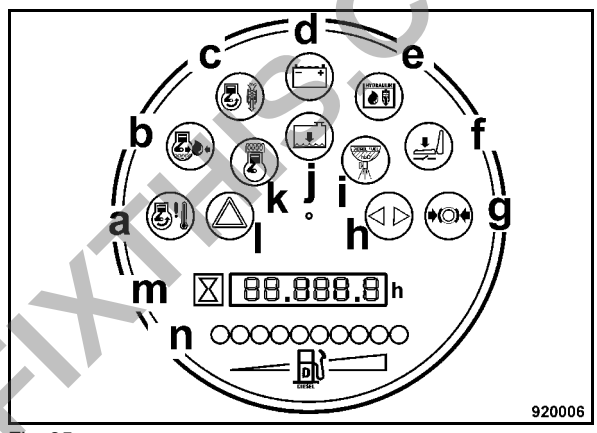


Fig. 85

- Check the fuel level on the fuel level gauge "n" (Fig. 85) with the ignition switched on.

i Note

Do not drive the fuel tank dry, as otherwise the fuel system needs to be bled.

- Clean the area around the filler opening.

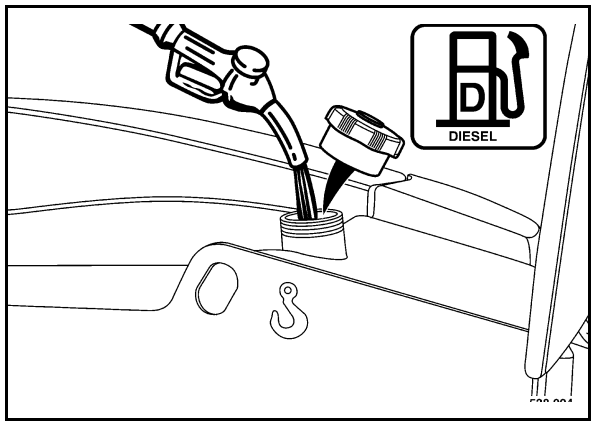


Fig. 86

- Open the fuel tank cover (Fig. 86).

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5.32 Changing hydraulic oil and breather filter

i Note

See also chapter 5.1 "Notes on the hydraulic system".

⚠ Caution

Apart from the normal oil change intervals, the hydraulic oil must also be changed after major repairs in the hydraulic system.

Perform the oil change when the hydraulic oil is warm.

Clean the area round hydraulic oil tank, filler opening and breather filter.

Do not use any detergents to clean the system.

Do not start the engine after draining the hydraulic oil.

Replace the hydraulic oil filter element with every hydraulic oil change.

⚠ Danger

Danger of scalding!

Danger of scalding by hot oil.

Environment

Catch running out oil and dispose of environmentally.

i Note

Generally replace the hydraulic oil filter element after the test run.

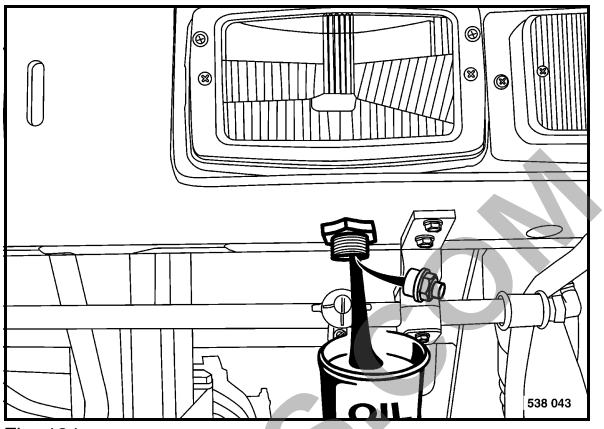


Fig. 131

- Unscrew the plug (Fig. 131) and drain off all hydraulic oil.
- Check seal ring (1), replace if necessary and turn the plug tightly back in.

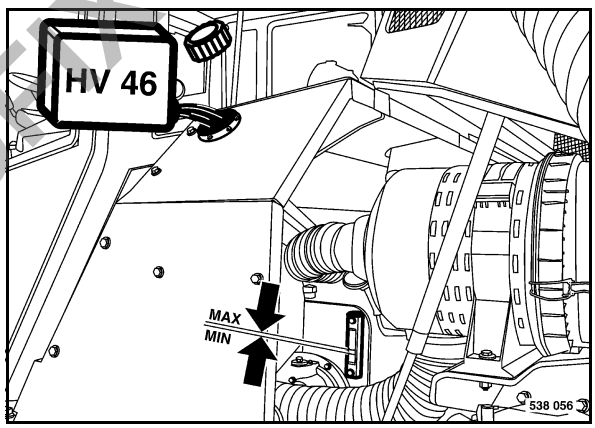


Fig. 132

- Remove the filler cap (Fig. 132).
- Fill in new hydraulic oil through the screen.

i Note

We recommend to use the filling and filtering unit (BOMAG part-no. 079 930 35) with fine filter to fill the hydraulic system. This ensures finest filtration of the hydraulic oil, prolongs the lifetime of the hydraulic oil filter and protects the hydraulic system.

- Check the oil level in the inspection glass.

Nominal value:

approx. 3 cm below the upper edge of the inspection glass

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