

# solo<sup>®</sup>

444 / 451

**Instruction manual**  
**Original instructions**

**Mistblower**

en

**Important!**

Read this instruction manual carefully before first operation and strictly observe the safety regulations!



## Instruction manual

### Original instructions

 **Caution!** Prior to operating the unit, please read the owner's manual carefully, and most importantly, observe all safety rules.

Observe the maintenance guidelines closely to ensure the long service life of your equipment.

Your dealer will be glad to assist you with any questions.

**EC declaration of conformity** → The EC declaration of conformity **on a separate piece of paper** forms part of these operating instructions.

### Packaging and disposal

Please keep the original packaging in order to protect the equipment against transport damage in case you ever need to ship it or transport it. If the packaging materials are no longer required then they must be disposed of properly in accordance with applicable local regulations. Cardboard packaging materials are raw materials which can be recycled or reused.

At the end of the equipment's service life, please make sure that you dispose of it properly, in accordance with the official directives and regulations that apply in your area



For **USA** only

### Emissions Control Warranty Statement

The Environmental Protection Agency and Solo are pleased to explain the emission control system on your small non-road power equipment engine. In the US new small non- road engines must be designed, built, and equipped to meet the Environmental Protection Agency's standards. Solo must warrant the emission control system on your small non- road engine for the period of time listed below provided there has been no abuse, neglect, or improper maintenance of your small non-road engine.

Your emission control system includes parts such as the carburetor, the ignition system, and the exhaust system.

Where a warrantable condition exists, Solo will repair your small non-road power equipment engine at no cost to you including diagnosis, parts, and labor.

### Manufacturers Warranty Coverage

Solo's small non-road power equipment engines are warranted for a period of two years. If any emission control related part on your engine is defective, the part will be repaired or replaced by Solo.

Contact Information for Authorized Service Center

Locations, Replacement Parts,

Warranty and Technical Information

Warranty repairs **must** be completed by a SOLO Authorized Service Center.

SOLO USA, Inc.

1-800-765-6462

5100 Chestnut Avenue

techserv@solousa.com

Newport News, VA 23605

## Symbols

The following symbols are used in this manual and on the product:



Always handle this power tool with particular care



Keep open flames away from the power tool and the fuel can



Thoroughly read these operating instructions before undertaking any maintenance, installation and cleaning steps



Wear ear defenders and a face shield before starting the engine



Wear protective gloves when handling and working with the equipment



No-one else may remain in the vicinity of the motor appliance whilst it is operating.



A breathing mask should be worn when using poisonous chemicals



Pesticides can be flammable.



Never smoke near the power tool or where the equipment is refuelled!



Switch off engine



Fuel mixture



Choke open

Operation and warm start



Choke closed,

Cold start position

## Type plate



a: Type designation

b: Serial number

c: Build year (10 → 2010)

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Please obtain the following practical accessories from your SOLO Dealer:

1. Accessories		Part No.
<b>ULV-nozzle</b>	ULV-Nozzle with ULV dosage selector for application of minute amounts of high concentrated substances (ultra-low volume application technique), with dosage accuracy.	49 00 479
<b>Double Nozzle</b>	To broaden spray stream or to treat two rows simultaneously.	49 00 137
<b>ULV Dosage Selector Attachment for</b>	For application of minute amounts of high concentrated substances (ultra-low volume application technique), with dosage accuracy.	49 00 169
<b>Liquid Booster Pump</b>	Increases formula output and application range.	Model 444: 44 00 114 Model 451: 44 00 235
<b>Extension Tube 60 cm</b>	Multiple Combinations possible with use of Liquid Booster Pump	49 00 333
<b>SOLO plant protection unit cleaner</b>	in a metering bottle 500 ml	49 00 600

2. Important Components

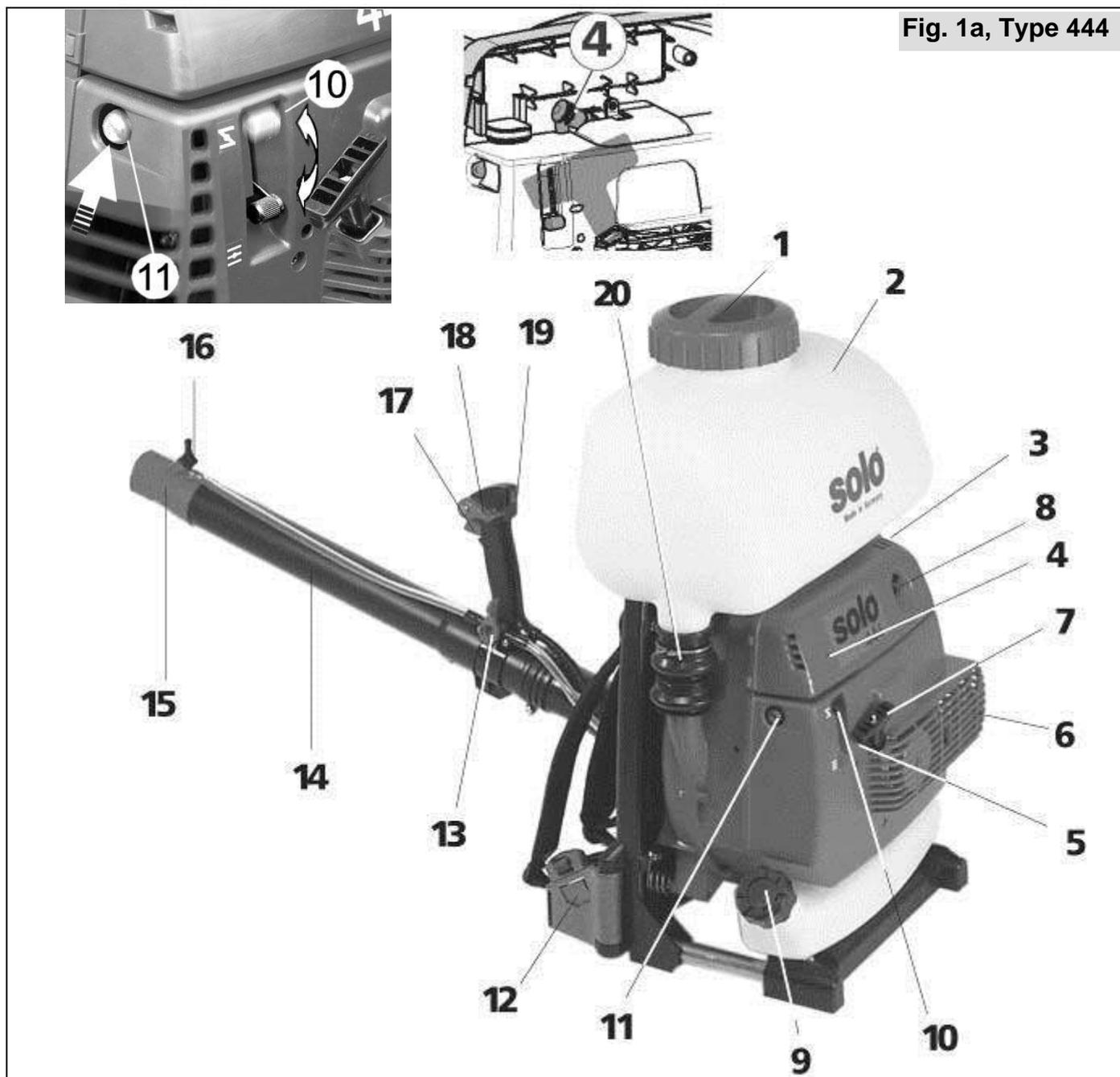
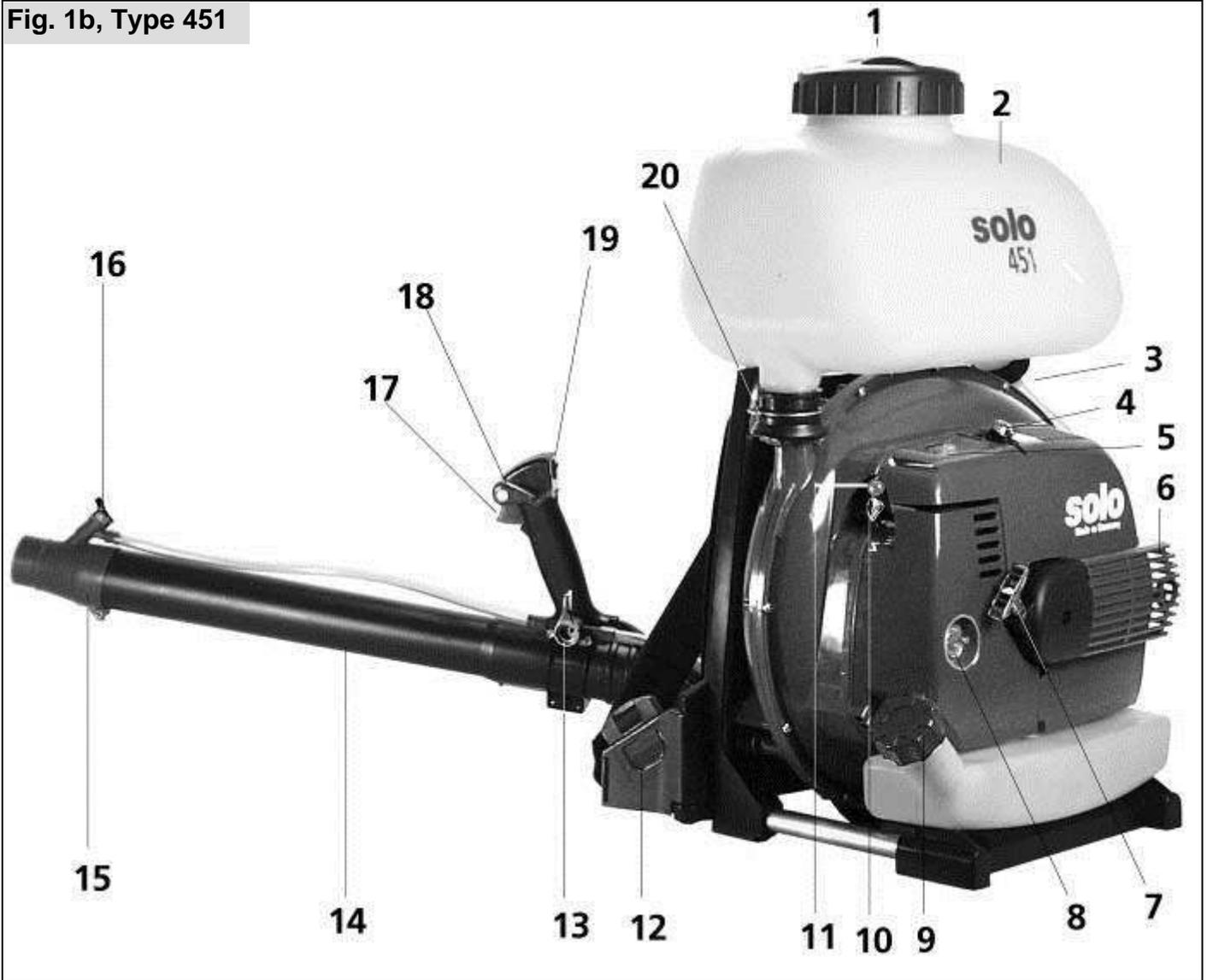


Fig. 1a, Type 444

1. Tank lid / Filler basket with filter	11. Primer
2. Formula tank	12. Shoulder strap – quickcoupling
3. Formula outlet	13. Formula On-off tap
4. Spark plug	14. Spray tube
5. Carburetor adjustment screws	15. Spray nozzle
6. Muffler	16. Dosage sleeve
7. Starter handle	17. Throttle lever
8. Air filter cover	18. Throttle lock lever
9. Fuel tank cap	19. Stop switch
10. Choke	20. Tank ventilation

Fig. 1b, Type 451



### 3. Safety regulations

#### 3.1 Correct use / Application

The machine may only be used for the following areas of application:

- The blower is suitable for applying pesticides approved by the national regulatory authorities. Closely observe the instructions provided by the pesticide manufacturer. Within certain limits, the amount to be applied is subject to the position of the spray tube. During operation, if the spray tube is directed upwards at an angle of more than 30° to the horizontal, use the liquid pump that is available as a special accessory.
- The dusting attachments, available as accessories, can be used to adapt the sprayer for granulate application, e.g. chemical fertilizer or fish food in granulate form, and to apply grass seed. This usage is only permissible **without a liquid pump**.
- The machine also enables the removal of leaves, grass, paper, dust or snow, e.g. in gardens, sports stadiums, parking lots or driveways; when used as a sprayer → **without filling – without a liquid pump**. Observe local regulations.

According to its type designation, this equipment is suitable for:

Agriculture, horticulture, orchards, green spaces, vineyards, nurseries.

The mistblower may only be used for the jobs it has been designed for – **and no other!** Always observe all safety hints while using the machine.

### 3.2 General safety instructions

 Some parts on the machine have been removed for transport purposes. Prior to first use, the mistblower has to be completely assembled. This mistblower may only be started and used when completely assembled.

 Read the operating instructions carefully before placing in service and keep them in a safe place. First time users should be instructed by the seller or an expert.

 The operator is liable towards others within the operating area of the mistblower. Only operate the mistblower when in good physical condition. Fatigue and illness lead to carelessness and accidents.

Proceed in a careful and alert manner.

- Never use a machine while under the influence of alcohol or drugs.
- The air exit speed from the nozzle is very high. Never point the nozzle towards persons or animals.

### 3.3 Personal protective equipment for your safety

 Always wear appropriate clothing and protective equipment whenever this power tool is used.

- Wear appropriate protective clothing which covers all body parts. This includes gloves, head protection, foot protection, body protection and possibly an apron or breathing mask. Clothing should be suitable, i.e. tight without being obstructive. Do not wear a scarf, necktie, jewellery or any clothing which can get caught on shrubs or branches.
- Wear firm shoes with good traction, preferably safety shoes.

 Wear protective gloves with non-slip grip.

 Use personal ear protection (such as ear muffs, ear plugs or similar) and a face mask or safety goggles to protect against spray drift or airborne debris.

 When using spray medium that can be hazardous to health, wear a breathing mask to prevent poisoning.

- Any clothing soaked with chemical or petrol should be changed immediately.

Always observe accident prevention regulations issued by local trade organizations or workers compensation boards.

### 3.4 Protection of Environment

#### Be aware of your surroundings

- Watch out for animals which may be within your work area
- Be aware that noise is harmful to the environment. Inquire about and respect possible local rest periods.

### 3.5 Operating Hints

- While running, the engine produces toxic exhaust gas which is odourless and invisible. Never start or operate the machine in closed rooms. Ensure for adequate ventilation in confined areas such as ditches or dips.
- No other persons should be present within a circle of 15 meters from the operator. Watch out for children and animals. Objects carried by the air stream can deflect and injure nearby persons.
- Never operate on unstable ground watch out for any obstacles such as tree stumps, tree roots, ditches, etc.
- Take special care while working along slopes.
- Never touch a hot exhaust.

 **WARNING!** This machine produces an electromagnetic field during operation. This field may under some circumstances interfere with active or passive medical implants. Persons with medical implants have to consult their physician and the medical implant manufacturer before operating this machine.

## 4. Technical Specifications

Mistblower		444	451
Engine type		SOLO single cylinder two-stroke engine	
Engine capacity	cm <sup>3</sup>	40.2	66.5
Bore / stroke	mm	40 / 32	46 / 40
Max Engine power (ISO 8893)	kW at rpm	1.5 / 6500	2.1 / 5750
Max. permissible speed	rpm	7000 ± 200	5900 ± 200
Fuel tank capacity	l	1.5	1.9
Fuel mix ratio:	with SOLO 2T Oil with other two-stroke oils	1:50 (2%) 1:25 (4%)	
Carburettor		All-position diaphragm carburettor with primer and integrated fuel pump	
Air filter cartridge		Paperstyle	
Ignition		Electronically controlled magneto ignition, maintenance free	
Total Formula Tank Capacity	l	13	13 / 21 (Typ 451-02)
Nominal Formula Tank Capacity	l	12	12 / 20 (Typ 451-02)
Strain funneled mesh size	mm	0.55	
Residual volume which the equipment cannot properly apply	ml	< 100	
Strainer for accessory sets mesh size	mm	0.32	
Max. Blower Air Volume *)	m <sup>3</sup> /h	900	1400
Weight	kg	10.0	10.8
Dimensions without Spray Tube	mm	high: 690 width: 500 depth: 260	high: 690 width: 550 depth: 280
Medium idling speed	rpm	2900 ± 200	2200 ± 200
In determining the following values regarding the acceleration of vibrations and sound, the different operating conditions were weighted in accordance with the current standards			
Sound pressure level L <sub>Peq</sub> (EN ISO 3744)	dB(A)	89	94
Sound power level L <sub>Weq</sub> (EN ISO 3744)	dB(A)	97	103
Weighted effective acceleration a <sub>hv,eq</sub> (EN ISO 5349)	m/s <sup>2</sup>	< 2	< 2

\*) without Spray Tube

## 5. Maintenance and care



Any cleaning, maintenance or repair jobs should only be performed when the engine is stopped and with removed spark plug cap.

The exception, of course, is carburetor tuning.

Any service jobs, other than those described in this manual, should only be carried out by an authorized service center. Only original parts may be used for any maintenance and service work.

Never modify your motorized mistblower – your personal safety is at risk.

Never service or store the machine near an open flame.

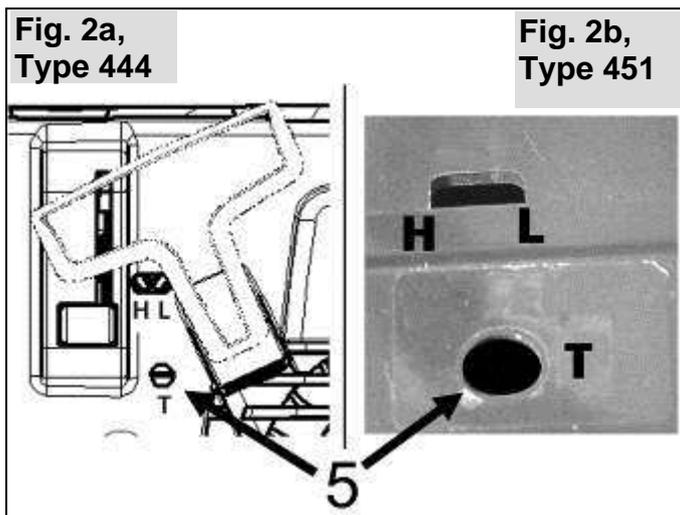
Regularly check the fuel tank lid for sealing and tank ventilation. Only use recommended spark plugs. Check ignition cable for any damage.

After a running in period of approx. 5 hours, all accessible screws and nuts (except for carburetor mixture adjustment needles) have to be checked and re-tightened if required.

Never operate a motorized mistblower with a damaged muffler or without muffler (fire risk and risk of damage to hearing). Do not touch hot muffler.

### 5.1 Carburettor adjustment

The carburettor has been adjusted optimally at the factory. Subject to the operational altitude (mountains or low lying areas), the carburettor may require readjustment.



The carburetor has 3 adjusting screws (Fig. 1 - 5):

- Idling end-stop screw "T"
- Low speed mixture screw "L"
- High speed mixture screw "H"

 Only qualified mechanics must adjust the regulating screws for idle mixture "L" and full load mixture "H".

Turn the idling end-stop screw "T" to adjust the idling speed in accordance with the details provided in the specification. Use an engine rev counter for this job.

- If the idling speed is too high, turn the idling end-stop screw "T" anti-clockwise.
- If the idling speed is too low (engine stops) turn the idling end-stop screw "T" clockwise until the engine runs smoothly.

If the idling speed cannot be set correctly with the idling end-stop screw "T", request an authorised service centre to tune the carburettor.

### The following instructions are for authorised service shops

Information about the standard settings can be requested from the specialist workshop of our customer service department or downloaded from our Internet portal for specialist dealers at [www.part-and-more.org](http://www.part-and-more.org).

Use the D-CUT carburettor key to adjust the idle mixture screw "L" and the full load mixture screw "H".

Clean the air filter before adjusting the low speed screw!

Let the engine run warm before adjusting the engine speed.

 The carburettor is tuned for optimum engine performance. Use a rev counter to tune the carburettor correctly!

Do not adjust the engine to a higher speed.

Excessive engine speed can lead to major engine damage!

## 5.2 Air Filter Maintenance

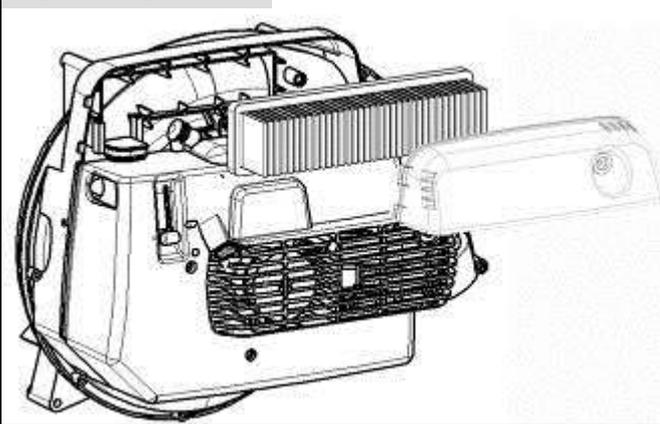
The air filter separates and retains dirt before the air reaches the combustion chamber. This reduces engine wear.

Regular maintenance increases engine life.

Clogged air filters cause performance loss and increased fuel consumption. This leads to a higher toxin level in the exhaust gas and also makes starting more difficult.

When the machine is used all day, the air filter should be cleaned daily. In severe dust conditions clean more often in between.

**Fig. 3a, Type 444**



**Fig. 3b, Type 451**



Undo the screw (Fig. 1, Pos 8) completely (screw is retained inside the filter cover) and remove the filter cover.

For a simple cleaning procedure we recommend tapping the air filter.

**Never use a high pressure air cleaner nor wet or moist cleaning. Do not use solvent or oil bath cleaners!**

If engine rpm's tend to drop although the carburettor adjustments are perfectly set, the air filter cartridge is clogged and must be replaced by a new one (Type **444**: Order-Nr. 20 48 282)

(Type **451**: Order-Nr. 20 48 280).

Never do realignments on the factory carburettor settings in order to balance a clogged air filter system. This procedure would cause engine damages due overload of the engine.

Warranty claims cannot be accepted for damaged engine parts caused by improper care and maintenance

Insert the new or cleaned fabric air filter into the casing.

Secure the filter cover by turning the screw (Fig. 1, Pos 8) clockwise.

## 5.3 Spark Plug

The correct spark plug with thermal range 200 is available under the following brands:

**BOSCH WSR6F**

The correct electrode gap is 0.5mm.



**Caution:** Check the plug after every 50 operating hours and replace if electrodes are worn.

## 5.4 Storage Hints / Transport Hints

If the unit is to be laid up or kept idle for any length of time, proceed as follows:

- Rinse and clean thoroughly. Never use formula container of your mist blower for storing chemicals.
- Shut off fuel cock and keep engine running until lines and carburetor are empty. Otherwise gasoline evaporates, and the remaining lubricant would clog the carburetor ducts.
- Remove spark plug and squirt an ounce or two of corrosion inhibitor (LPS, WD-40 etc.) or plain engine oil into the cylinder. Crank engine several times to spread the agent, and then reinsert spark plug.
- Please store your machine away from sunlight, order to protect of the materials against influence of ultraviolet radiations.
- Before putting the unit back into service, remove and clean spark plug; crank engine a few times with plug removed.



**For transport in a vehicle, ensure the mistblower is well secured to avoid fuel spillage.**

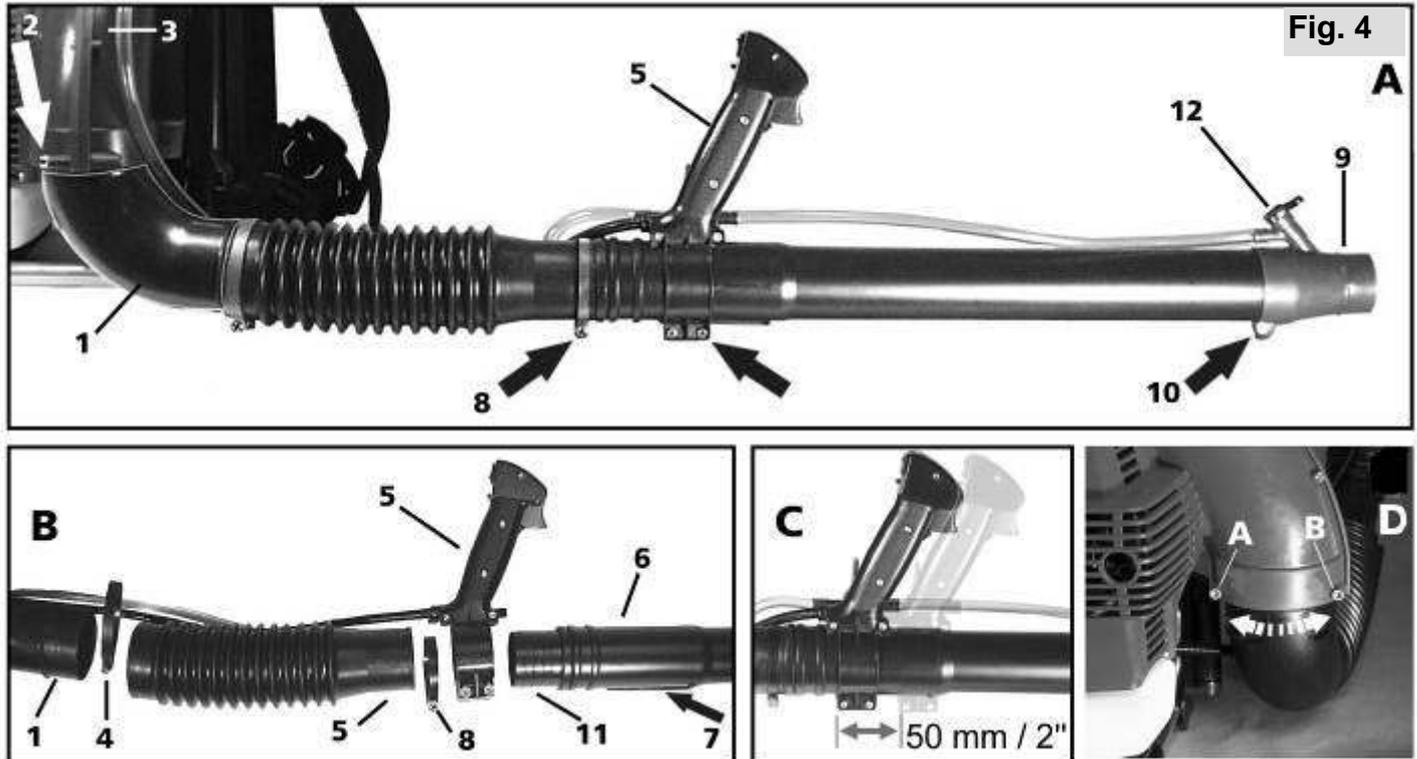


Completely empty the fuel tank before extended storage or shipment.

## 6. Assembly



Completely assembly the mistblower before its first use:



### Assembly of misting equipment

Attach the blower elbow (1) to the blower housing and secure with both screws (Fig.4D; A+B). Ensure the elbow can swivel easily. Push pleated hose onto blower elbow and secure with clamp (4).

### Assembly of handle, spray tube and spray nozzle

Push handle (5) onto spray tube (start from the front) and fix in the required position (Fig.4C). A guide (7) on the spray tube will ensure vertical positioning.

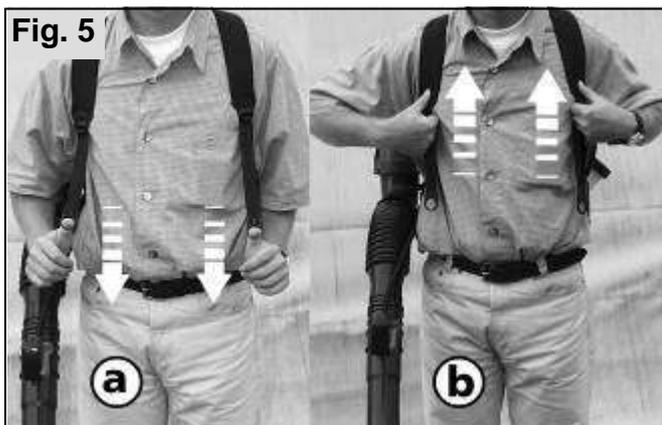
Push the spray tube with twist coupling (11) into the pleated hose (5) until locked. Secure with clamp (8).

Note: The spray tube can be twisted and turned in the pleated hose with the handle. Ensure that all hose and cable connections are safe and without sharp bends.

Place spray nozzle (9) on to spray tube (vertical to handle) and secure (10).

Push formula delivery hose (2 pieces) on nipple of the handle and to the spray nozzle. Secure the hose alongside the pleated hose. Shut on/off tap (vertical position), fill some plain water in formula tank and check for any leakage.

## 7. Adjustment of shoulder straps



Place the mistblower on the back and connect to quick couplings on either side.

The straps can be adjusted to the required length with friction slides. Simply pull down both strap ends to tighten straps (a).

Strap tension can be released by lifting both friction slides (b).

### Note:

The shoulder straps are correctly adjusted when the back plate of the mist-blower rests firmly against the back of the operator.

## 8. Fuel information



The engine of your motorized mistblower is a high performance 2-cycle engine and has to be operated with a fuel/oil mix or with a special, pre-mixed fuel for 2-cycle engines available from specialized dealers.

For the fuel mixture, use lead-free regular (standard) petrol, lead-free Euro-petrol or lead-free Super (premium) petrol. The minimum octane rating is 92 ROZ.

### Mixing Ratio:

We recommend a mixing ratio of 50 parts fuel to 1 part of oil (1:50 – 2%) with the use of special 2-cycle oil “**SOLO Profi 2T Oil**”. When using other 2-cycle oils we recommend a mixture ratio of 1:25 (4%). Note: Never store fuel mixture for longer than 3-4 weeks.

### Fuel mixture table

Petrol in litres	Oil in litres	
	SOLO 2T Oil 2% (1:50)	Other two-stroke oils 4% (1:25)
1	0,020	0,040
5	0,100	0,200
10	0,200	0,400

**For the first 5 tank fillings, also when using special 2-cycle oils, use a mixing ration of 1:25 (4%)!**

- Smoking or open flame is prohibited
- Allow engine to cool before re-fuelling
- Fuel may contain solvent-like substances. Avoid skin and eye contact with mineral products. Wear gloves while refueling. Frequently change and clean protective clothing. Do not inhale fuel vapors.
- Do not spill fuel or oil. In case of spillage, immediately wipe off mistblower. Do not allow fuel mix to contact clothing. If fuel mix is spilled on clothing, change clothing immediately.
- Ensure fuel or oil do not contaminate soil (environmental protection). Always use a suitable protective soil cover.
- Do not re-fuel in unventilated rooms. Fuel vapors collect at ground level (danger of explosion).
- Transport and store fuel and oil only in approved and clearly marked containers. Children should have no access to fuel or oil.
- Ensure you do not inhale exhaust fumes while using the machine. The use of the motorized mistblower is prohibited in closed rooms.



**The handling of fuel requires caution and consideration. It is imperative that all safety instructions are observed! Only refuel when the engine has been stopped!**

- Clean the area around filler inlet before refueling.
- Remove tank lid and fill fuel mix up to the lower edge of the filler neck. Do not overfill. If possible, always use a fuel funnel with filter.
- Fill in card fully to avoid spilling of fuel or oil.
- Replace and secure fuel tank lid.

## 9. Filling



- For filling the equipment, always use the strainer inside the filler neck and observe the filler area through the filling process.
- Prevent any direct contact between the external filling hose and the tank contents.
- The spray medium must not be allowed to enter the water mains through backlash.
- When filling with spray medium, ensure that neither environment, nature nor the water mains ever make contact with the spray medium.
- Prevent the tank from overflowing, the contamination of public water, foul water and drainage channels.
- The strainer has a mesh size of 0.55 mm. Only use original SOLO strainers, part no.: 42 00 104 with standard mesh size.



Affix the appropriate label to identify the container content.

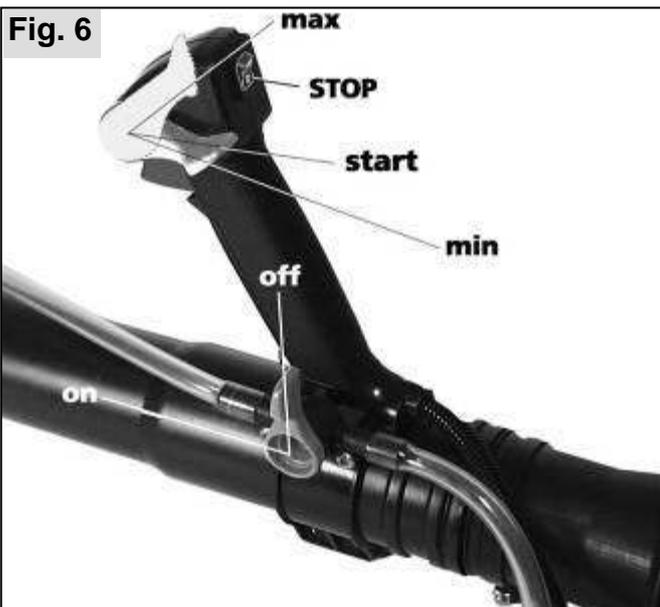
 Never pour different agents at the same time into the container. Before using a different agent, thoroughly clean out the container and all parts in contact with the spray agent, then flush with plenty of water.

## 10. Starting / Stopping the engine



- Before every use and before every start of the mistblower check and ensure the machine is in good and safe condition. (throttle operation, ignition switch, safety devices, shoulder strap and check for fuel leaks)
- During the starting procedure and while operating the mistblower, the operator must have secure footing and have a safe body position.
- The engine starting site should be at least 3 meters away from the refueling site.

### Starting with cold engine



- Switch ignition switch to "I" position and close (OFF) formula on/off tap .
- Move throttle lock lever to "Start" position.

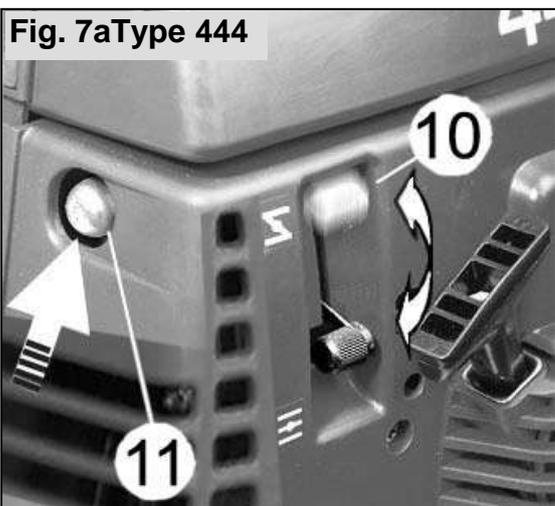
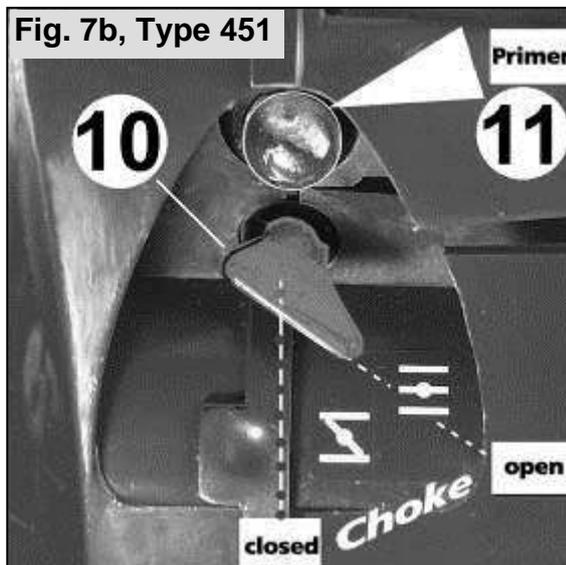


Fig. 7b, Type 451



Close choke with choke lever (10).

- Press primer (11) several times until fuel is visible in the primer.
- Place your left hand on the formula tank of the mistblower. Hold the starter handle (Fig. 1.Pos. 7) with your right hand and pull the handle up slowly until resistance is felt. Then pull up firmly and rapidly until the engine 'fires'.
- Once the engine tries to start, immediately open the choke and continue to start.
- When the engine runs, use the throttle lever to accelerate to the required engine speed. For continuous use, set the throttle lock lever (Fig. 1, Pos. 18) in the required position for the desired engine speed.
- To return to idling speed, either release the throttle lever or move throttle lock lever down to "min" position.

### Starting with warm engine after short stop

- Leave choke in "open" position and start engine.

Should the engine refuse to start despite several starting attempts, the combustion chamber is most likely flooded.

In this case we recommend you remove and dry the spark plug (Fig.1, 4). Set the ignition switch to "stop" and set throttle lock lever (Fig. 1, 18) to full throttle position "max". Pull over engine several times, still with spark plug removed. This will ventilate the combustion chamber

Replace spark plug and repeat starting procedure.



## Shutting off engine

- Release throttle lever and move throttle lock lever to "min" position.
- Move ignition switch to "Stop" position until engine stops.

## 11. Operation hints



### 11.1 Misting Hints

Open formula on/off tap: Lever in horizontal position – ON – (Fig.5).

Shut formula on/off tap: Lever in vertical position – OFF - (Fig.5).

The liquid output volume is adjusted by turning the dosage sleeve to different positions.

When spraying predominantly upwards (tall trees) we recommend using the liquid pump offered as an accessory (part no.: type **444** → 44 00 114, type **451** → 44 00 235)

#### Misting Output Guide Type 444

Dosage sleeve 	A		B	
	l/min	l/min	l/min	l/min
Position 1	0.50	0.25	0.50	0.50
Position 2	0.90	0.40	1.30	1.25
Position 3	1.85	0.85	2.40	2.30
Position 4	2.40	1.15	3.20	3.15

With wide-range nozzle (7), wide-angle grille (7a)

#### Misting Output Guide Type 451

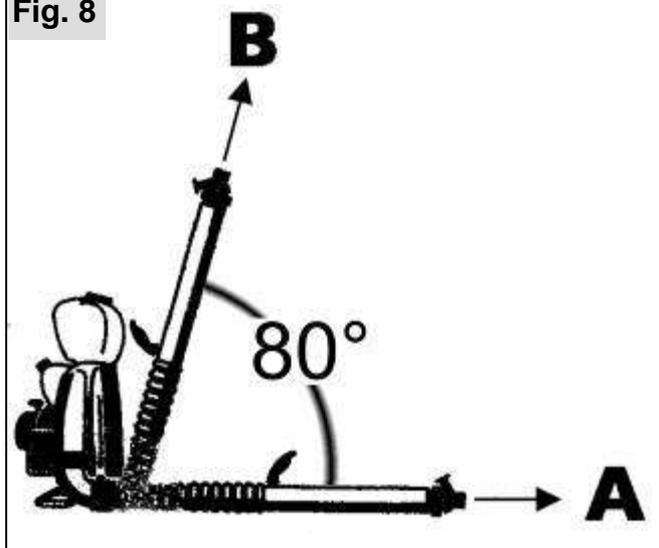
Dosage sleeve 	A		B	
	l/min	l/min	l/min	l/min
Position 1	0.60	0.15	0.55	0.50
Position 2	1.15	0.25	1.20	1.20
Position 3	2.25	0.40	2.30	2.10
Position 4	3.00	0.45	3.05	3.00

With wide-range nozzle (7), wide-angle grille (7a)

Note: The liquid pump attachment comprises a special metering body, which should be installed when using a liquid pump.

**Please note: When using a liquid pump, ensure that the tank contains sufficient liquid. The liquid pump can sustain severe damage, if it is permitted to run dry. When using the equipment as a mister and as blower, remove the pump for that reason.**

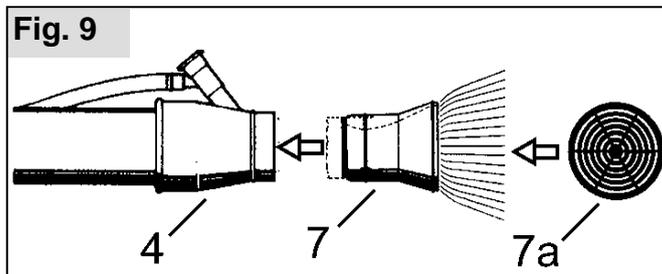
Fig. 8



### 11.2 Spraying

Approach the target object with the engine at idling speed. Accelerate to full engine speed, then open formula on-off tap.

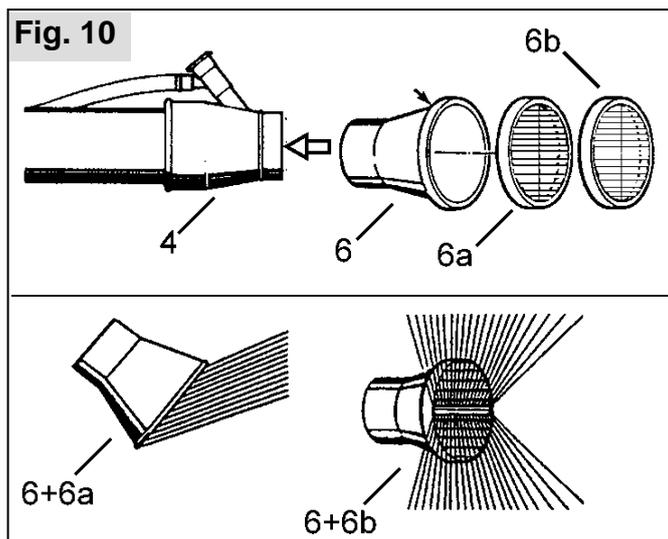
#### Wide-range nozzle (7):



When spraying plants and trees we recommend fixing the wide-range nozzle (7) onto the red standard nozzle (4). This ensures that a large area can be sprayed at one time. Push the wide-range nozzle onto the standard nozzle, until the bead engages.

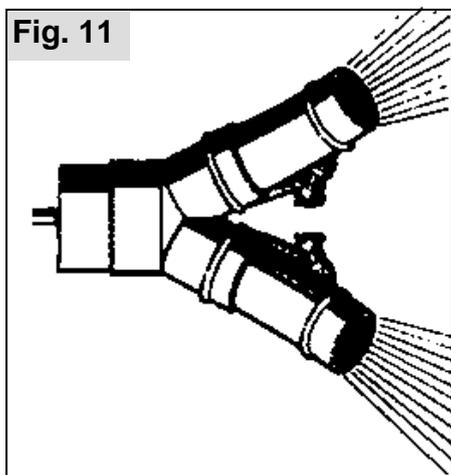
In narrow spaces and for aftercare, we recommend placing the wide-angle grille (7a) onto the wide-range nozzle. This ensures that the spray velocity is reduced and the spray is applied more widespread, to prevent damage to leaves.

Nozzle attachment (6):



The nozzle attachment (6) is positioned onto the standard nozzle (4) with the selected grille. Use the dual grille (6a) when spraying cultures in rows (e.g. vines, tomatoes, nurseries), to achieve a good covering on the underside of the leaves. The deflector grille can be replaced with a dual grille (6b). The dual grille provides a 90° - 110° spray pattern. The dual grille is usually used for spraying two rows at a time. The deflector grille and the dual grille can be placed onto the external diameter of the nozzle, until the bead engages.

Dual nozzle (accessories, part no.: 49 00 137):



Remove standard nozzle (4) from the spray wand and push the dual nozzle onto the spray wand.

**11.3 Residual spray medium**

Switch off the appliance as soon as no further liquid is expelled, when the metering body is correctly positioned for spraying, or air bubbles are visible inside the lance supply hose.

The tank will then contain less than 100 ml residual medium.

If you don't want to refill the tank with spray medium and you want to terminate spraying, dilute

the residual medium with 2 l of water. Dispose of this solution on the treated area.

**11.4 Strainer for accessory sets**

When using the liquid pump (accessory part no.: type **444** → 44 00 114, type **451** → 44 00 235) or the ULV accessory (part no.: 49 00 479), a strainer is integrated into the tank connector.

The strainer has a mesh size of 0.32 mm. Only use original strainer part no.: 25 00 198 with standard mesh size when replacing the strainer.

**11.5 Checking the spray medium flow rate**

At the beginning of the spraying season, check whether the equipment flow rate (l/min) still corresponds to the „Guide values“ table (see also item „Maintenance schedule“).

For this, fill the equipment up to the maximum marker with water, start using the equipment and spray for one minute exactly at maximum operating pressure. Then measure the water volume required to bring the water level back up to the maximum marker.

The actual volume measured represents the flow rate of the equipment in l/min at maximum operating pressure.

It should not deviate by more than 10 % from those listed in the „Guide values“ table. Should the actual value be too low, sediments inside the metering body may be the cause. Clean the corresponding parts and repeat the checking procedure.

Should the actual value be too high, the metering body may be worn or damaged. In that case, replace the metering body with a new one (part no.: 40 74 165).

When using accessory sets (liquid pump part no.: type **444** → 44 00 114, type **451** → 44 00 235 or ULV accessory, part no.: 49 00 479) a strainer will be integrated into the tank connector.

In that case, an incorrect flow rate can also be due to a contaminated or worn strainer.

Clean or replace the contaminated/worn strainer (part no.: 25 00 198).

### 11.6 Draining and cleaning the tank

For cleaning purposes, the tank can be fully drained into a suitable container via the supply hose.

For this, the engine must be cooled down.

Position the equipment onto a stable higher support, so that the spray medium can drain into a suitable container below.



Above the container, pull the supply hose from the shut-off valve.

If required, tip the equipment slightly to drain the tank completely.

Ensure that the spray medium does not run over the equipment (especially the engine), but drains directly into the suitable container.

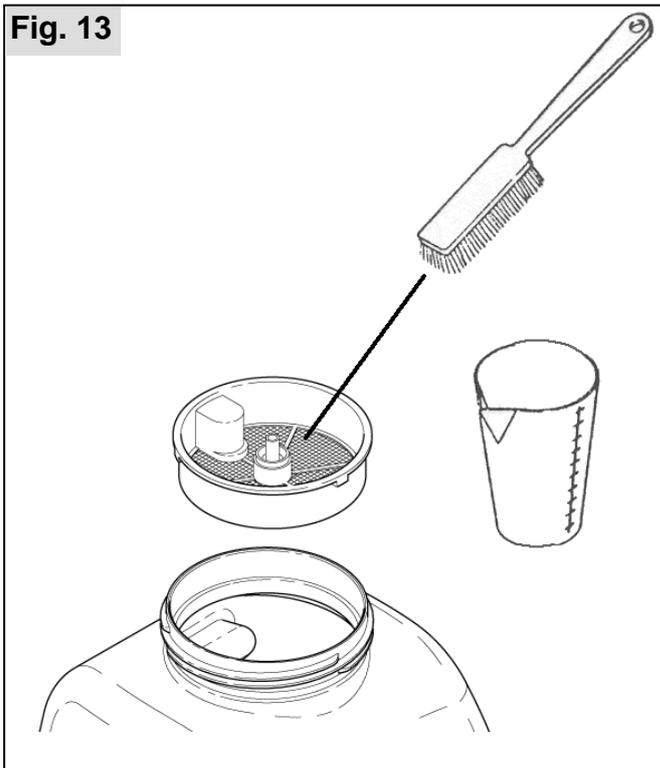
Dispose of residual spray medium correctly at disposal sites licensed for specialised waste.

Empty the spray medium tank daily after work and flush thoroughly with water.

Observe cleaning instructions supplied with the herbicide/fungicide.

After cleaning, let the spray medium container dry in an open state.

**Fig. 13**



Occasionally clean the strainer inside the filler neck, the strainer in the accessory set and all parts in contact with the medium, with water and a soft brush.

## 12. Maintenance Plan

The following information is based on standard operating conditions.  
For special conditions, such as prolonged daily use, the recommended maintenance intervals should be reduced accordingly.

Implement all maintenance jobs regularly. If required, authorise a specialist service centre to maintain the machine for you. The owner of the machine is responsible for:

- Any damage caused by a lack of maintenance, incorrect or late maintenance and repairs
- Consequential losses - including corrosion - from incorrect storage

		before starting work	daily	weekly	after the first 5 hours	after every 50 hours work	as required	before spray season
<b>Carburettor</b>	Check idling speed	X						
	Adjust idling speed						X	
<b>Air filter</b>	Clean		X					X
	Replace						X	
<b>Spark plug</b>	Check the electrode gap and adjust, if required					X		X
	Replace						X	
<b>Cooling air inlet</b>	Clean			X			X	X
<b>Cylinder fins</b>	Clean			X				X
<b>Fuel tank</b>	Clean					X		X
<b>All accessible screws</b> (except for adjusting screws)	Retighten				X		X	X
<b>Operating handle</b>	Check function	X						
<b>Overall Unit</b>	Visual inspection	X						
	Clean						X	X
<b>Spray medium flow rate</b>	Check							X
<b>Spray medium tank</b>	Clean		X					
<b>Strainer inside the filler neck</b>	Clean						X	X
<b>Strainer for accessory sets</b>	Clean						X	X
<b>Metering body</b>	Clean						X	X
<b>Soundness of all equipment parts</b>	Check	X						X
<b>Hand valve function</b>	Check	X						X

## 13. Workshop service, replacement parts and guarantee

### 13.1 Maintenance and repair

Maintenance and repair of modern motorized devices, as well as their safety-relevant assemblies, require qualified, specialized training and a workshop equipped with special tools and test devices. Thus SOLO recommends that you have a specialized SOLO workshop carry out all work that is not described in these operating instructions. Your SOLO specialist has the required training, experience, and equipment at his disposal to provide you with the most cost-effective solution and can help you in many ways with advice and service.

### 13.2 Replacement parts

Dependable operation and the safety of your device also depend on the quality of the replacement parts that you use. Use only original SOLO replacement parts. Only original parts come from the production of the device and thus guarantee the highest possible material quality, dimensional accuracy, function, and safety. Original replacement parts and accessory parts are available from your dealer. He also maintains the requisite replacement part lists to determine the required replacement part numbers, and he is constantly provided with information concerning detail improvements and innovations in the replacement part offering. Please note as well that guarantee performances from SOLO are not possible if parts other than SOLO original parts are used.

### 13.3 Guarantee

SOLO guarantees problem-free quality and will assume the costs for defect remediation by replacing the defective parts in the case of material or manufacturing defects that occur within the guarantee period after the date of purchase. Please note that specific guarantee conditions apply in some countries. Ask your sales person if you have any questions. As vendor of the products he is responsible for the guarantee. We request your understanding that no guarantee can be assumed for damages due to the following:

- Non-compliance with the operating instructions.
- Neglecting required maintenance and repair work.
- Damages due to improper carburetor adjustment.
- Normal wear and tear.
- Obvious overload through persistently exceeding the upper performance limits.
- Using non-approved tools and cutting fixtures, Using non-approved cutting bar and chain lengths in the case of chain saws.
- The use of force, improper handling, misuse, or accident.
- Damages caused by overheating due to dirt build up on the ventilator casing.
- Intervention by non-specialized persons, or improper repair attempts.
- The use of unsuitable replacement parts or parts other than SOLO original parts to the extent that they cause damage.
- Using unsuitable fuel or fuel that has been stored too long.
- Damages that can be traced to implementation conditions from the rental business.

Cleaning, care, and adjustment work are not recognized as guarantee performances. All guarantee work must be carried out by a SOLO dealer.

### 13.4 Parts subject to tear and wear

Various parts are subject to application-specific or normal wear and must be replaced in good time, when required. The following parts are subject to normal wear and are not covered by the manufacturer's guarantee:

- Air filter
- Fuel filter
- All rubber parts which come into contact with fuel
- Spark plug
- Starter

In the best interest of continued technological progress we reserve the right to change the design and configuration of any product without prior notice.

For that reason, no claims can be accepted with reference to text and illustrations in this manual

# **solo**<sup>®</sup>

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