



Thank you for choosing this product

Silverline Tools 3 Year Guarantee

- This guarantee becomes effective at the date of retail purchase.
PLEASE KEEP YOUR RECEIPT.
- If this product develops a fault within 30 days of purchase, return it to the stockist where it was purchased, with your receipt, stating details of the fault. You will receive a replacement or refund.
- If this product develops a fault within 3 years of purchase return it to;

Silverline Tools Service Centre
PO Box 2988
Yeovil
BA21 1WU

Include your original receipt, details of the fault, your name and address, place and date of purchase. We do not refund carriage. All products should be in a suitably clean and safe state for repair, and should be packaged carefully to prevent damage or injury during transportation. We may reject unsuitable or unsafe deliveries.

- You must provide proof of purchase before any work can be carried out.
- All work will be carried out by Silverline Tools or its authorised repair agents.
- Any parts which are replaced will become the property of Silverline Tools.
- The repair or replacement of the product will not extend the period of guarantee.
- The repair or replacement of your product under guarantee provides benefits which are additional to and do not affect your statutory rights as a consumer.

What is covered:

- The repair of the product, if found to be defective due to faulty materials or workmanship within 3 years of purchase. If any part is not available or out of manufacture, Silverline Tools will replace it with a functional replacement part.
- Use of the product in the UK.

What is not covered:

Silverline Tools does not guarantee repairs required as a result of:

- Normal wear and tear e.g blades, brushes, belts, bulbs, batteries etc.
- Accidental damage, faults caused by negligent use or care, misuse, neglect, careless operation or handling of the product.
- Use of the product for anything other than normal domestic purposes.
- Change or modification of the product in any way.
- Use of parts and accessories which are not Silverline Tools genuine components.
- Faulty installation (except installed by Silverline Tools).
- Repairs or alterations carried out by parties other than Silverline Tools or its authorised repair agents.



Users Manual
52cc Petrol Chainsaw
508mm (20") Bar
Product Code 634009
© December 2007



Introduction

This manual is an integral part of the chainsaw and should be kept with it at all times. If the chainsaw is re-sold this manual should be included in the sale.

Safety Messages

A safety message is to alert you to potential dangers that could hurt you or others. Each safety message is preceded by one of three words **DANGER**, **WARNING** or **CAUTION**.

These words mean

DANGER: YOU WILL BE KILLED OR SERIOUSLY INJURED IF YOU FAIL TO FOLLOW THE INSTRUCTIONS.

WARNING: YOU CAN BE KILLED OR SERIOUSLY INJURED IF YOU FAIL TO FOLLOW THE INSTRUCTIONS.

CAUTION: YOU CAN BE SERIOUSLY INJURED IF YOU FAIL TO FOLLOW INSTRUCTIONS.

Each safety message tells you what the hazard is, what can happen and what you can do to avoid and reduce injury.

There are other important messages preceded with the word **NOTICE**.

NOTICE: MEANS YOUR CHAINSAW OR OTHER PROPERTY COULD BE DAMAGED IF YOU FAIL TO FOLLOW INSTRUCTIONS.

The purpose of these messages is to help prevent damage to you, your chainsaw, other property and the environment.

General Safety Instructions

Even when used as prescribed it is not possible to eliminate all residual risk factors. Use with caution.

Keep guards in position

• Always keep guards in position, in good working order, correctly adjusted and aligned. Never attempt to use a tool without any guard supplied with it.

Remove adjusting keys

• Always check to see that keys and adjusting wrenches are removed from tool before turning on.

Clean work area

• Accidents occur where benches and work areas are cluttered or dirty, floors must be kept clear, avoid working where the floor is slippery.

Dangerous environment

• Provide adequate surrounding work space and keep area well lit. Do not use tools where there is a risk of explosion or fire from combustible material, flammable liquids, flammable gases or dust of an explosive nature.

Children & Pets

• Children and pets should always be kept at a safe distance from your work. Make your workshop child-proof. Lock tools away where children can't get access to them.

Use the correct tool

• Don't force, or attempt to use a tool for a purpose it was not designed for. Do not use a small tool to do the job of a heavy duty tool.

Wear correct clothing and footwear

• Don't wear loose clothing, neckties or jewellery or other items which may get caught in moving parts. Wear non-slip footwear, cover or tie back long hair. Use safety footwear if necessary.

Protect your head

• Wear safety goggles at all times, every day glasses are not sufficient for eye protection, as lenses are not impact resistant and could shatter. Use an approved face or dust mask when operation creates dust. Ensure dust extraction equipment is functioning and correctly used. Hearing protection should be used if the sound intensity level for the operator could exceed 80dB(A). Use a hard hat where there is a risk of falling objects or striking your head on low level obstructions.

Protect yourself from vibration.

• Hand held tools may produce vibration. Vibration can cause disease. Gloves to keep the operator warm and dry and therefore maintain good blood circulation in the fingers may help. This tool has not been designed for extended or industrial operation.

Secure work

• Always secure work. Where practical use a clamp or vice, it will allow you to use both hands to operate your tool.

Keep your balance

• Don't over reach, keep proper footing at all times to ensure correct balance.

Maintain your tool

• Keep your tool in good working order, keep tools sharp and clean for best and safest performance. Ensure ventilation holes are kept clean and unrestricted at all times.

Accessories

• The use of any attachment or accessory other than those mentioned in this manual could result in damage or injury. The use of improper accessories could be dangerous.

Never stand on your power tool

• Standing on your tool could cause serious injury if the tool is tipped or if the cutting tool is accidentally contacted. Do not store materials above or near the tool so that it is necessary to stand on the tool or its stand to reach them.

Check for damaged or missing parts.

• Before each use check if any part of the power tool is damaged or missing, check carefully that it will operate properly and perform its intended function. Check alignment of moving parts for binding. Any guard or other part that is damaged should be correctly repaired or replaced. Do not use if the power switch does not turn the power on and off. Check any other condition that may affect the safety of the power tool. **DO NOT USE IF DEFECTIVE.**

Direction of feed

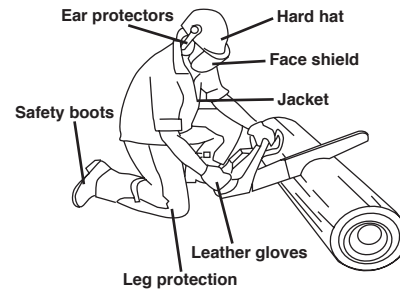
• Feed work into a blade or cutter against the direction of rotation of the blade or cutter only.

Don't leave the tool running unattended

• Always wait until your power tool has come to a complete stop before leaving it.

GENERAL WARNINGS

Wear close fitting, durable work clothing that will provide adequate protection. Long trousers, jacket, safety work shoes, heavy duty work gloves, hard hat, safety face shield or safety glasses for eye protection and a good grade of ear protection.



Turn unit off before, setting down, or checking fittings.

Hold unit firmly, hold with both hands, the thumb and fingers encircling both handles.

Keep all screws and fastener tightened, never operate machinery improperly adjusted or unsecurely assembled.

Keep handles dry, keep clean and free of fuel mixture.

Do not use any other fuel, always use recommended fuel.

Follow instructions in the fuel and lubrication section of the user guide. Failure to do this will result in permanent engine damage voiding manufacturer's warranty.

Do not smoke while refuelling or operating unit.

Do not touch or let hands or body come into contact with the units muffler. Hold unit with both hands, thumb and fingers encircling both the handles.

NEVER allow children to operate unit.



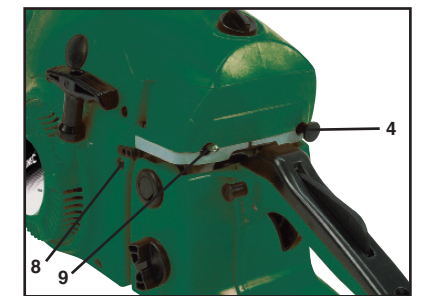
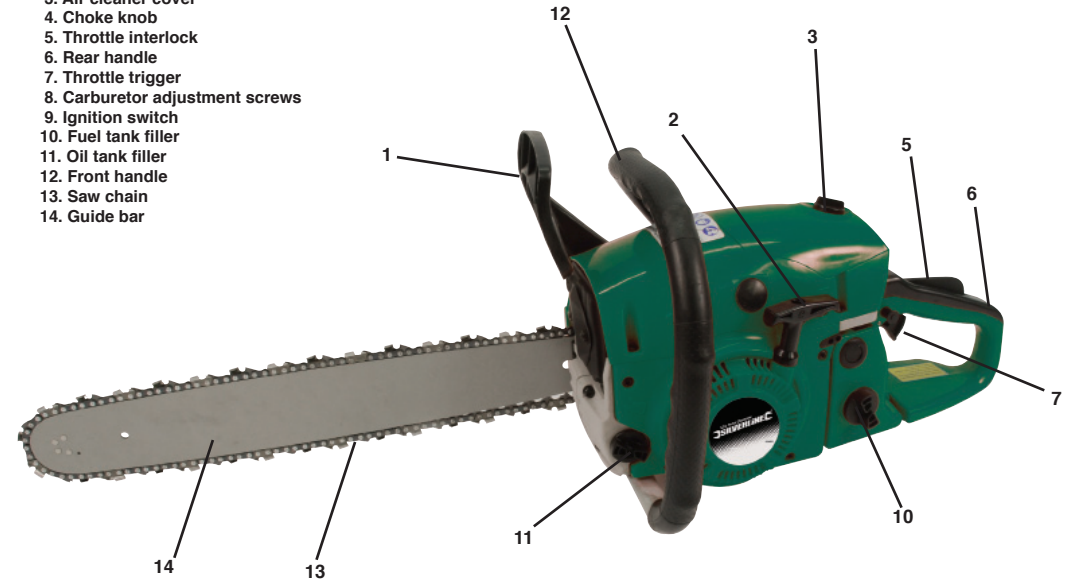
This product produces poisonous exhaust fumes as soon as the engine is running. These gases may be colourless and odourless. To reduce the risk of serious or fatal injury, never run the machine indoors, or in poorly ventilated areas. Ensure proper ventilation when working in trenches or other confined spaces.

Product Familiarisation

52cc Petrol Chainsaw

508mm Bar

1. Front guard
2. Starter knob
3. Air cleaner cover
4. Choke knob
5. Throttle interlock
6. Rear handle
7. Throttle trigger
8. Carburetor adjustment screws
9. Ignition switch
10. Fuel tank filler
11. Oil tank filler
12. Front handle
13. Saw chain
14. Guide bar



SPECIFICATION

Fuel: Unleaded petrol / 2 stroke mix (25:1)
 Fuel tank capacity: 520ml
 Oil tank capacity: 260ml
 Engine displacement: 51.2cc
 Maximum engine power: 2.6kW
 Maximum engine speed with cutting attachment: 10000RPM
 Maximum engine speed at idling: 3000RPM

Sprocket: 7 Tooth
 Saw chain type: USA Semi-chisel
 Saw chain pitch: 3/8"
 Saw chain gauge: 1.27mm(0.058")
 Guide bar type: Sprocket nose
 Guide bar size: 508mm (20")
 Max cutting length: 480mm
 Oil feeding system: Automatic
 Sound pressure: 104dB(A)
 Sound power: 116dB(A)
 Weighted vibration: 7.07m/s²
 Rear: 7.62m/s²

Front: 7.07m/s²
 Rear: 7.62m/s²

PRIOR TO USE

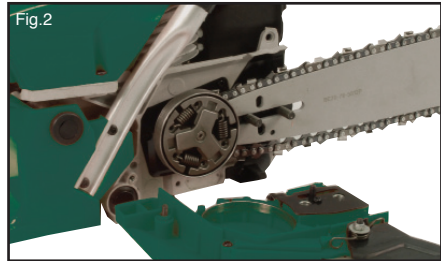
Installing guide bar and saw chain

Open the box and install the guide bar and the saw chain on the power unit as follows:

WARNING!

The saw chain has very sharp edges. Use thick protective gloves for safety.

1. Pull the guard (1) towards the front handle to check that the chain brake is not on.
2. Loosen the nuts and remove the chain cover. (Fig.2).
3. Gear the chain to the sprocket and, while fitting the saw chain around the guide bar, mount the guide bar to the power unit. Adjust the position of chain tensioner peg on the power unit to the lower hole of guide bar.



4. Fit the chain cover to the power unit and fasten the nuts to finger tightness.
5. While holding up the tip of the bar, adjust the chain tension by turning the tensioner screw (located to the side of the guide bar) until the tie straps just touch the bottom side of the bar rail.
6. Tighten the nuts securely with the bar tip held up (12~15N.m). Then check the chain for smooth rotation and proper tension while moving it by hand. If necessary, re-adjust with the chain cover loose.

NOTE:

A new chain will stretch when first used. Check and re-adjust the tension frequently as a loose chain can easily de-rail or cause rapid wear of itself and the guide bar.

Fuel and chain oil

Fuel

- The motor uses two stroke fuel, a mixture of petrol and a 2 stroke lubricant at 25:1
- Use a branded 90 octane or higher unleaded petrol.

NOTE two stroke fuel may separate, Shake fuel container thoroughly before each use. Do not mix more fuel than you expect to use within one month.

WARNING!

- Keep open flames away from the area where fuel is handled or stored.
- Mix and store fuel only in an approved petrol container.

NOTE:

Most engine troubles are caused, directly or indirectly, by the fuel used on this machine. Take special care when mixing.

Chain oil

Use motor oil SAE# 10W ~ 30 all year round or SAE #30 ~ #40 in summer and SAE#20 in winter.

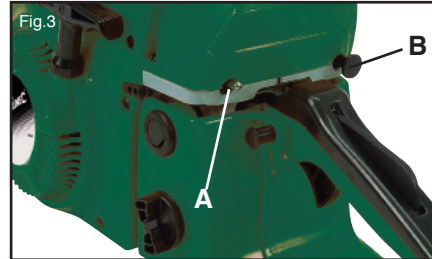
NOTE:

Do not use waste or re-generated oil as this will cause damage to the oil pump.

OPERATING INSTRUCTIONS

Starting engine

1. Fill fuel and chain oil tanks respectively and tighten the caps securely.



- (A) Ignition Switch
(B) Choke Knob

2. Put the ignition switch to "I" position. (Fig. 3).
3. Pull out the choke knob to the starting position.

NOTE:

When re-starting immediately after stopping the engine, leave the choke knob at the RUN position.

4. While holding the saw unit securely on the ground, pull the starter rope vigorously.

WARNING!

Do not attempt to start the chainsaw whilst holding in one hand as this can cause injury.

5. When engine fires, push in the choke knob and pull the starter again to start the engine.
6. Allow the engine to warm up with the throttle lever pulled slightly.

WARNING!

Keep clear of the saw chain as it will start rotating once the engine has started.

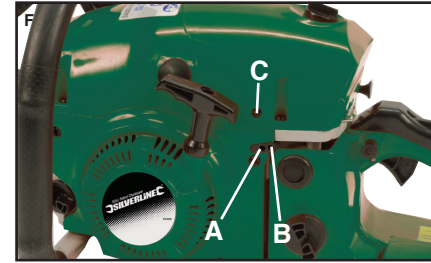
Check oil supply

After starting the engine, run the chain at medium speed and see if chain oil is scattered off.

NOTE:

The oil tank should become nearly empty by the time fuel is used up. Be sure to refill the oil tank every time when re-fuelling the unit.

Adjusting carburettor (Fig.4)



- (A) L Needle
(B) H Needle
(C) Idle adjusting screw

The carburettor on your unit has been factory adjusted, but may require fine tuning due to change in operating conditions. Before adjusting the carburettor, make sure to renew the clean air/fuel filters and use fresh, properly mixed fuel. When adjusting, take the following steps:

NOTE:

Be sure to adjust the carburettor with the bar and chain attached.

1. Stop engine and screw in both H and L needles until they stop. Do not force or over tighten. Then set them back the initial number of turns as shown below.

H Needle:

L Needle: 1

2. Start engine and allow it to warm up at half-throttle.
3. Turn L needle slowly clockwise to find a position where idling speed is maximum, then set the needle back a quarter (1/4) turn counterclockwise.
4. Turn idle adjusting screw (C) counterclockwise so that the saw chain does not turn. If idling speed is too slow, turn the screw clockwise. (Fig. 4.)
5. Make a test cut and adjust the H needle for best cutting power, not for maximum speed.

Stopping engine

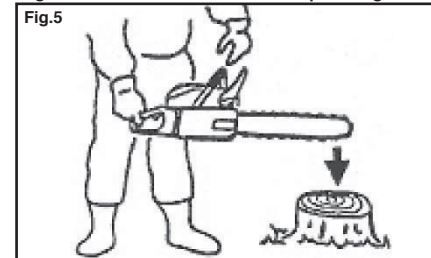
1. Release the throttle lever to allow the engine to idle for a few seconds.
2. Put the ignition switch to the "O" (STOP) position.

CAUTION

Ensure the brake is fully operational prior to use.

To do this:

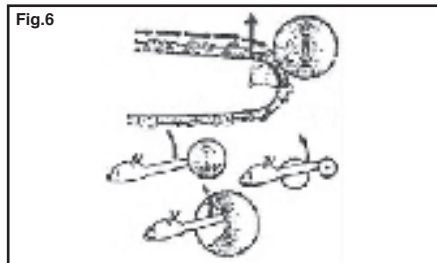
- (1) Turn off the engine.
- (2) Holding the chainsaw horizontally, release your hand from the front handle, hit the tip of the guide bar to a stump or a piece of wood, and confirm brake operation. Operating level varies by bar size. (Fig. 5). In case the brake is not effective. Refer to the guarantee on the back of this manual about inspection and repairing. The engine, if being kept rotated at high speed with the brake engaged, will heat the clutch, causing a problem. When the brake is operated while in operation, immediately release your fingers from the throttle lever and keep the engine idling.



Sawing
WARNING!

- Before proceeding to your job, read the following sections. It is recommended to first practice sawing easy logs. This also helps you get accustomed to your unit.
- Always follow the safety regulations. The chain saw must only be used for cutting wood. It is forbidden to cut other types of material. Vibrations and kickback vary with different materials and the requirements of the safety regulations would not be respected. Do not use the chainsaw as a lever for lifting, moving or splitting objects. Do not lock it over fixed stands.
- It is not necessary to force the saw into the cut. Apply only light pressure while running the engine at full throttle.
- When the saw chain is caught in the cut, do not attempt to pull it out by force, but use a wedge or a lever to open the way.

Guard against kickback (Fig. 6)



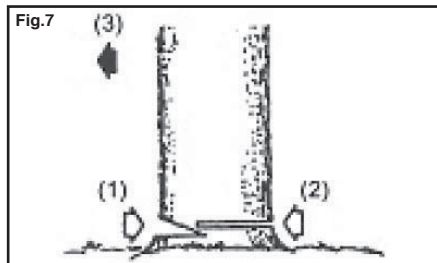
This saw is equipped with a chain brake that will stop the chain in the event of kickback if operating properly. You must check the chain brake operation before each usage by running the saw at full throttle for 1-2 seconds and pushing the front hand guard forward. The chain should stop immediately with the engine at full speed. If the chain is slow to stop or does not stop, replace the brake band and clutch drum before use.

It is extremely important that the chain brake be checked for proper operation before each use and that the chain is sharp in order to maintain the kickback safety level of this saw. Inadequate maintenance, or incorrect replacement of the bar or chain may increase the risk of serious personal injury due to kickback.

Felling a tree (Fig. 7)

WARNING!
When you fell a tree, be sure to warn your neighbouring workers of the danger.

- (1) Notch cut
- (2) Felling cut
- (3) Felling direction



1. Choose the felling direction considering the wind, lean of the tree, location of heavy branches, ease of job after felling and other factors.
2. While clearing the area around the tree, arrange a good foothold and retreat path.
3. Make a notch cut one-third of the way into the tree on the felling side.
4. Make a felling cut from the opposite side of the notch and at a level slightly higher than the bottom of the notch.

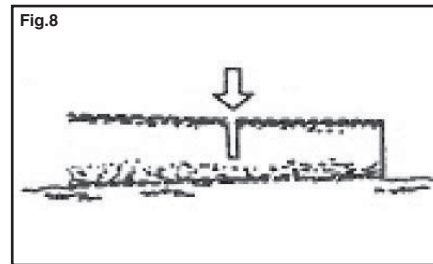
Bucking and limbing
WARNING!

- Always ensure your foothold. Do not stand on the log.
- Be alert to the rolling over of a cut log. Especially when working on a slope, stand on the uphill side of the log.
- Follow the previous sections instructions "guard against kick back" to avoid kickback of the saw.

Before starting work, check the direction of bending force inside the log to be cut. Always finish cutting from the opposite side of bending direction to prevent the guide bar from being caught in the cut.

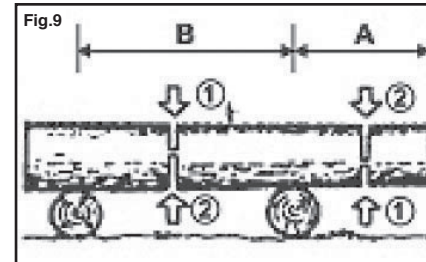
A log lying on the ground (Fig. 8)

Saw down halfway, then roll the log over and cut from the opposite side.

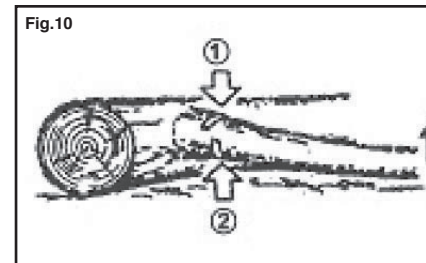


A log hanging off the ground (Fig. 9)

In area A, saw up from the bottom one-third and finish by sawing down from the top. In area B, saw down from the top-third and finish by sawing up from the bottom.



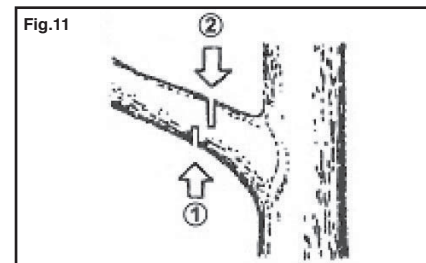
Cutting limb of fallen tree (Fig. 10)



First check to which side the limb is bent. Then make the initial cut from the bent side and finish by sawing from the opposite side.

WARNING!
Be alert to the possibilities of spring back from a cut limb.

Pruning of standing tree (Fig. 11)



Cut up from the bottom, finish down from the top.

- WARNING!**
- Do not use an unstable foothold or ladder
 - Do not overreach.
 - Do not cut above shoulder height.
 - Always use both hands to grip the saw.

MAINTENANCE & STORAGE

WARNING!
Before cleaning, inspecting or repairing your unit, make sure the engine has stopped and is cool. Disconnect the spark plug to prevent accidental starting.

Maintenance after each use

1. Air filter
To access the air filter, remove the air filter cover. To remove the filter, unscrew the top lid and withdraw the filter element. The element can be cleaned with a light brush or compressed air.

2. Oiling port
Dismount the guide bar and check the oiling port for clogging.
3. Guide bar
When the guide bar is dismounted, remove saw dust in the bar groove and the oiling port.
Grease the nose sprocket from the feeding port on the tip of the bar.

- (A) Grease port
- (B) Sprocket

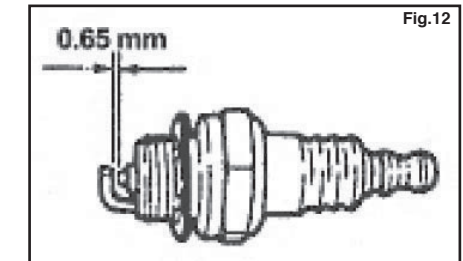
4. Other
Check for fuel leakage and loose fastenings and damage to major parts. Especially handle joints and guide bar mounting. If any defects are found, make sure to have them repaired before operating again.

Periodical service points

1. Cylinder fins
Dust clogging between the cylinder fins will cause overheating of the engine. Periodically check and clean the cylinder fins after removing the air cleaner and the cylinder cover.
When installing the cylinder cover, make sure that switch wires and grommets are positioned correctly in place.

NOTE:
Be sure to block the air intake hole prior to cleaning

2. Spark plug (Fig.12)



Clean the electrodes with a wire brush and reset the gap to 0.65mm as necessary.

3. Sprocket
Check for cracks and for excessive wear interfering with the chain drive. If wear is found, replace it with a new one. Never fit a new chain on a worn sprocket, or a worn chain on a new sprocket.
4. Fuel filter
Using a wire hook, withdraw the filter through the fuel tank filler and wash with petrol, or replace with new one if required.

Maintenance of saw chain and guide bar

Saw chain

WARNING!

It is very important for smooth and safe operation to keep the cutters sharp.

Your cutters need to be sharpened when:

- Saw dust becomes powder-like
- You need extra force to saw
- The cut way does not go straight
- Vibration increases
- Fuel consumption increases

Cutter setting standards

WARNING!

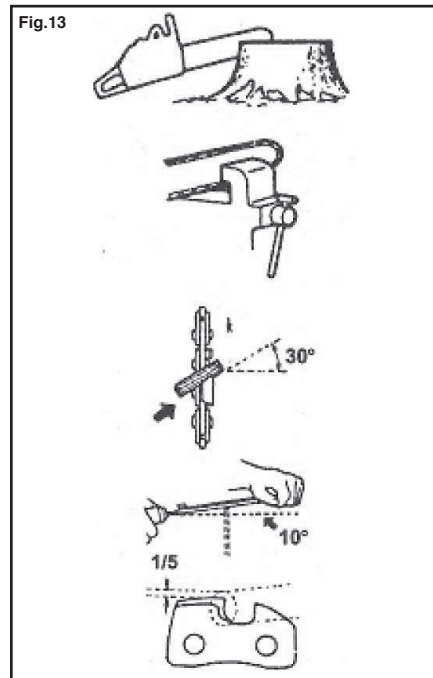
Be sure to wear safety gloves

Before filing:

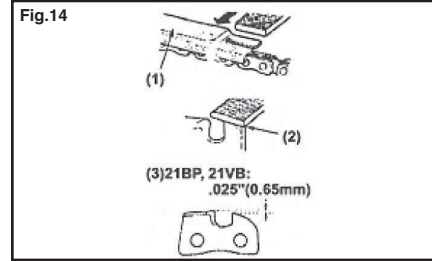
- Make sure the saw chain is held securely
- Make sure the engine is stopped
- Use a round file of proper size for your chain

File size: $\frac{3}{32}$ in (4.0mm)

Place your file on the cutter and push straight forward. Keep the file position as illustrated. (Fig. 13)



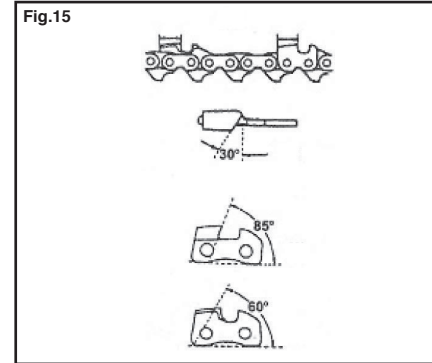
After every cutter has been set, check the depth gauge and file it to the proper level as illustrated. (Fig. 14).



WARNING!

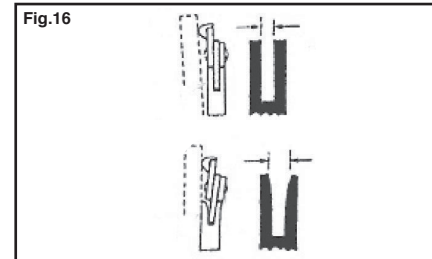
Be sure to round off the front edge to reduce the chance of kickback or tie-strap breakage.

Make sure every cutter has the same length and edge angles as illustrated (Fig. 15).



Guide bar

- Reverse the bar occasionally to prevent partial wear.
- The bar rail should always be a square. Check for wear of the bar rail. Apply a ruler to the bar and the outside of a cutter. If a gap is observed between them the rail is normal. Otherwise, the rail requires re-setting or replacement. (Fig. 16).



- The guide bar is provided with a sprocket at the tip, this must be lubricated with grease at all times.
- Keep the bar groove and lubrication hole clean.
- Check the bar rails frequently for wear and if necessary remove the burrs and square up the rails using a flat file.

WARNING!

NEVER mount a new chain on a worn sprocket

Fuel and oil

- NEVER store the unit with fuel in the tank in an environment where petrol fumes could come into contact with a flame, spark or sources of extreme heat.
- Store the unit in a clean and dry environment.
- Allow the motor to cool before storing.
- If fuel tank needs to be drained, do so outdoors when the motor is cold.
- Respect the environment and do not dispose of oil or petrol by pouring into the drainage system or into the ground.
- Do not add, remove or modify any of the units components. To do so could result in: Injuries to the operator and other persons present. Damage to the unit. Moreover this will invalidate the warranty.

Extended storage

- Inspect, clean and repair if necessary.
- Remove all fuel from tank safely.
- Remove spark plug and pour one tea spoon of clean oil into spark plug hole cylinder replace spark plug.
- Store in clean, dry area.

DANGER THIS UNIT PRODUCES CARBON MONOXIDE. UNDER NO CIRCUMSTANCES USE THIS PRODUCT INDOORS.

Failures such as difficulty starting unit, poor performance can normally be prevented if careful attention is paid to all operating instructions and maintenance procedures.

Trouble Shooting Guide

Problem	Possible cause	Remedy
Engine does not start	Is there fuel in the tank? There is no spark from the spark plug? Is the compression correct?	Refill the fuel tank Replace/check the spark plug Check compression
Engine smokes or runs poorly	Is the correct fuel being used?	Check the mix is 25:1 Unleaded petrol to oil
Motor stalls	Water in fuel Spark gap is wrong	Replace fuel Adjust spark gap

Checking the spark plug

Remove the spark plug cap and clean any dirt or debris from around the plug. Remove the spark plug and install it in the spark plug cap. Set the plugs electrode on the cylinder head. Crank the engine and sparks should jump across the gap. Spark gap 0.6 - 0.7mm (.23" .028")

WARNING!: Be sure that there is no spilled fuel around the spark plug. Split fuel may ignite.

WARNING!: Petrol is extremely flammable and is potentially explosive under certain circumstances. Do not smoke or allow sparks or flames in the area.

WARNING!: Never try to repair the unit, take to an authorised service centre.