WARNING DANGER

Read rules for safe operation and instructions carefully. ECHO provides an Operator's Manual with your original Power Pruner. The Operator’s manual and this manual must be read and understood for proper and safe operation.
INTRODUCTION

Welcome to the ECHO family. This ECHO product was designed and manufactured to provide long life and on-the-job-dependability. Read and understand this manual before operating the unit. You will find it easy to read and full of helpful operating tips and SAFETY messages.

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THE OPERATOR’S MANUAL --

contains specifications and information for operation, starting, stopping, maintenance, storage and assembly specific to this product.

CONTENTS

- Hedger Attachment
- Tool, Spanner
- Operator’s Manual

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Specifications, descriptions and illustrative material in this literature are as accurate as known at the time of publication, but are subject to change without notice. Illustrations may include optional equipment and accessories, and may not include all standard equipment.
MANUAL SAFETY SYMBOLS & IMPORTANT INFORMATION

Throughout this manual and on the product itself, you will find safety alerts and helpful, information messages preceded by symbols or key words. The following is an explanation of those symbols and key words and what they mean to you.

This symbol accompanied by the words WARNING and DANGER calls attention to an act or condition that can lead to serious personal injury to operator and bystanders.

The circle with the slash symbol means whatever is shown within the circle is prohibited.

IMPORTANT The enclosed message provides information necessary for the protection of the unit.

NOTE This enclosed message provides tips for use, care and maintenance of the unit.

SAFETY

WARNING ! DANGER

Read rules for safe operation and instructions carefully. ECHO provides an Operator's Manual with your original Power Pruner. The Operator's Manual and this manual must be read and understood for proper and safe operation.

- Wear eye, face, head, hearing, hand and proper clothing for protection.
- Review the area to be trimmed. Look for hazards that could contribute to unsafe conditions. DO NOT operate unit if any wires (power, telephone, cable, etc.) are closer than 15M (50 ft.) to any part of the operator or unit. PPT-2100/2400 are not insulated against electrical current.
- Spectators and fellow workers must be warned, and children and animals prevented from coming nearer than 15 M (50 ft.) while the Power Pruner is in use.
- Before each use inspect the entire attachment for breaks or cracks. If the Hedger is damaged in any way repair it immediately. DO NOT USE A DAMAGED ATTACHMENT.
- Use only a sharp, properly secured blade approved by ECHO for the Power Pruner Hedger Attachment.
- Use only one ECHO approved extension on the Pruner.
- Cut only wood. Avoid striking concrete, metal, wire, or other obstructions which could cause kickout or damage to the blade.
- ECHO, INC. will not be responsible for the failure of cutting devices or accessories which have not been tested and approved by ECHO for use with this unit.

WARNING ! DANGER

- Serious injury may result from the use of non approved blade. Read and comply with all safety instructions listed in this manual.
DECALS

Locate this safety decal on your attachment. Make sure the decal is legible and that you understand and follow the instructions on it. If a decal cannot be read, a new one can be ordered from your ECHO dealer. See PARTS ORDERING instructions for specific information.

Guard

WARNING  DANGER

- Read and understand owners manual before use.
- Do not operate within 15 meters (50 feet) of electrical hazards.
- Use only Echo approved Hedger Blade.
- Blade can thrust violently away from material.
- Blade can throw debris and objects violently.
- Keep nut on blade shaft tight.
- Coasting blade can seriously cut you or others.
- Do not operate without guard.

Failure to follow these instructions can result in serious personal injury.

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KICKOUT

WARNING  DANGER

Kickout can lead to dangerous loss of control of the Power Pruner and result in serious injury to the operator or anyone standing close by.

Kickout may occur when the moving blade accidentally touches an object, or when the blade contacts material it cannot cut. In some cases this may cause a lightning-fast reverse action, thrusting the Power Pruner up and toward or down and away from the operator. Either of these reactions may cause the operator to lose control of the unit which could result in serious personal injury.

With a basic understanding of kickout, you can reduce or eliminate the element of surprise which contributes to accidents.

Hold the unit firmly with both hands. Be aware of the path the cutting attachment will take after the cut is made.

The blade will continue to coast after throttle is released. Avoid accidental contact of the blade with any object while the blade is moving.

Cut only wood. Avoid striking concrete, metal, wire or other obstructions which could cause kickout or damage to the blade.

If the blade does strike a foreign object, immediately stop the engine, inspect and repair the Power Pruner if necessary.

NOTE
Refer to Safe Operation section, in your Power Pruner Operator’s Manual, for proper shoulder strap adjustment.
ASSEMBLY

HEEDGER ATTACHMENT INSTALLATION

Tools Required: Cross Head/Flat Head Screwdriver

Parts Required: Hedger Attachment

WARNING DANGER
The Hedger Attachment blade is sharp! Always wear gloves when handling assembly, otherwise serious personal injury may result.

1. Loosen the four (4) screws (A) and locator screw (B) on chain saw attachment.

NOTE
Do not remove screw (B) completely from chain saw attachment, otherwise inner lock nut will come loose and be lost.

2. Slide chain saw attachment off aluminum housing.

(PPFD-2400)

3A. Go to step five (5).

(PPT-2100, PPT-2400)

3B. Loosen center clamp knob (D) turning counter clockwise.

(PPT-2100, PPT-2400)

4. Pull aluminum housing (E) out of fiberglass housing 127mm (5 in.) or 152mm (6 in.), then slide (E) back into fiberglass housing leaving inner drive shaft (F) exposed. Align and join star shaped drive end of inner drive shaft (F) with hedger attachment shaft (G).

(ALL MODELS)

5. Align ridges on aluminum housing (E) with seams in hedger attachment and slide onto housing. Hedger attachment guard must be positioned properly when installed onto housing. (See Fig. 1)

6. Tighten four (4) hedger attachment screws (A).

(PPT-2100, PPT-2400)

7. Position upper drive shaft housing to desired extension length. Tighten center clamp knob (D) turning clockwise.
OPERATION

NOTE
Refer to your Power Pruner Operator’s Manual for correct engine fueling, starting and stopping instructions.

WARNING  DANGER
All overhead electrical conductors and communications wires can have electricity flow with high voltages. Never touch wires directly or indirectly when pruning, otherwise serious injury or death may result.

PRUNING TECHNIQUES

The Hedger attachment is designed for light to medium trimming of new growth limbs and branches up to 38mm (1-1/2”) in diameter. Follow these tips for successful operation.

- Plan cut carefully. Check direction debris will fall.
- Plan retreat path from falling debris. Cut branches bounce when striking ground.
- Inspect area for hidden electrical lines.
- Do not stand directly beneath material being cut.
- Spectators and fellow workers must be warned, and children and animals prevented from coming nearer than 15 M (50 ft.) while the Power Pruner is in use.
- Use a short sweeping motion to shape trees and shrubs.
- When ready to cut:
  1. Accelerate to full throttle.
  2. Tilt the top of the hedger slightly toward the hedge when making an upward sweep. Tilt the bottom of the hedger slightly toward the hedge when making a downward sweep. The hedger will cut in both directions.
  3. For heavier trimming it may be necessary to slow the sweeping motion to ensure optimum cut.
- DO NOT use for felling or bucking.

MAINTENANCE
- Grease gear case with lithium based grease every 3 months/100 hours or 6 months/1 year.
HEDGER BLADE REPLACEMENT

Tools Required: 19mm (3/4") Spanner, 14mm (9/16") Spanner

Parts Required: Blade, P/N 69601522060

**WARNING**

Failure to follow blade mounting instructions can cause blade to be thrown from Hedger Attachment and result in serious injury to the operator or anyone standing nearby.

1. Remove saw shaft end ring (A).
2. Hold saw spacer (D), located between guard and blade, with 19mm (3/4") spanner. Remove flange nut (B) turning counter clockwise.
3. Lift off outer saw collar (C) and blade.
4. Install new blade on inner saw collar (C) and saw spacer (D). Blade teeth should be angled toward direction of blade rotation.
5. Install outer saw collar (C) and flange nut (B).
6. Hold blade adaptor (D) from turning with spanner, and tighten nut (B) securely with 14mm (9/16") spanner turning clockwise.
7. Install shaft end ring (A).

BLADE SHARPENING

Tools Required: Medium 60 degree Triangular Saw File, Vise

1. Secure hedger blade vertically in a vise with teeth angled to the right.

2. Uniformly file each blade tooth to the angle specification shown.
SERVICING INFORMATION

PARTS
Genuine ECHO Parts and ECHO Re Power Parts and Assemblies for your ECHO products are available only from an Authorized ECHO Dealer. When you do need to buy parts always have the Model Number, Type number and Serial Number of the unit with you. You can find all three numbers on the engine housing. For future reference, write them in the space provided below.

Model No. ____________  Type No. ____________  SN. __________

SERVICE
Service of this product during the warranty period must be performed by an Authorized ECHO Service Dealer. For the name and address of the Authorized ECHO Service Dealer nearest you, ask your retailer or call: 1-800-432-ECHO. When presenting your unit for Warranty service/repairs, proof of purchase is required.

ECHO CONSUMER PRODUCT SUPPORT
If you require assistance or have questions concerning the application, operation or maintenance of this product you may call the ECHO Consumer Product Support Department at 1-800-673-1558 from 8:00 am to 5:00 pm (Central Standard Time) Monday through Friday. Before calling, please know the model and serial number of your unit to help your Consumer Product Support Representative.

WARRANTY CARD
This card is our means of registering all original owners of ECHO equipment. The card plus proof of purchase provides you the assurance that authorized warranty work will be done. It also provides a direct link between you and ECHO if we find it necessary to contact you.

ADDITIONAL OR REPLACEMENT MANUALS
Owner’s and Parts Manuals are available for purchase from your ECHO dealer or directly from ECHO. [See ordering instructions below.]

ORDERING INSTRUCTIONS
To obtain a Parts Catalog or Owner’s Manual send a check or money order for $2.00 per Parts Catalog or $1.50 per Owner’s Manual made payable to ECHO, INCORPORATED. State on a sheet of paper the model number and serial number of the ECHO unit you have, part number of the manual (if known), your name and address and mail to address above.

Available Parts Catalog

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<th>Type</th>
<th>Serial Range</th>
<th>Catalog Number</th>
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