Operator’s Manual
SRM-225
Grass Trimmer / Brushcutter

⚠️ WARNING
The engine exhaust from this product contains chemicals known to the State of California to cause cancer, birth defects, or other reproductive harm.

⚠️ WARNING
Read and understand all provided literature before use. Failure to do so could result in serious injury.
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INTRODUCTION

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.

Read and understand all provided literature. Literature contains specifications and information for safety, operation, maintenance, storage and assembly specific to this product. Scan QR codes for more information.

For additional literature, including safety manuals where applicable, or questions regarding terms used in this manual, visit:

https://www.echo-usa.com/manuals

OR

https://www.shindaiwa-usa.com/manuals

SERVICING INFORMATION

Parts/Serial Number

Genuine ECHO 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 and Serial Number of the unit with you. For future reference write them in the space provided below.

Model No. _______________    Serial No. _______________
SRM-225 SERVICING INFORMATION

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 (3246). Dealer information is also available on our Web Site www.echo-usa.com. 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, call the ECHO Consumer Product Support Department at 1-800-432-ECHO (3246) 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.

Product Registration
Register your ECHO equipment on-line at www.echo-usa.com or by filling out the product registration sheet included in this manual. Registering your product confirms warranty coverage and provides a direct link to ECHO if we find it necessary to contact you.

Additional Literature
In addition to finding information online, information is available from your Authorized ECHO Service Dealer, or by contacting ECHO Inc., 400 Oakwood Road, Lake Zurich, IL 60047 (1-800-432-ECHO (3246)).
SAFETY Manual Safety Symbols and Important Information

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

⚠️ DANGER

The safety alert symbol accompanied by the word “DANGER” calls attention to an act or condition which WILL lead to serious personal injury or death if not avoided.

⚠️ WARNING

The safety alert symbol accompanied by the word “WARNING” calls attention to an act or condition which CAN lead to serious personal injury or death if not avoided.

⚠️ CAUTION

The safety alert symbol accompanied by the word “CAUTION” calls attention to an act or condition which may lead to minor or moderate personal injury if not avoided.

囔 NOTICE

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.

🚫 CIRCLE AND SLASH SYMBOL

This symbol means the specific action shown is prohibited. Ignoring these prohibitions can result in serious or fatal injury.
### International Symbols

<table>
<thead>
<tr>
<th>Symbol</th>
<th>Description</th>
<th>Symbol</th>
<th>Description</th>
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<tr>
<td>![Wear Eye, Ear and Head Protection]</td>
<td>Wear Eye, Ear and Head Protection</td>
<td>![T]</td>
<td>Carburetor Adjustment - Idle Speed</td>
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<tr>
<td>![Safety/Alert]</td>
<td>Safety/Alert</td>
<td>![STOP]</td>
<td>Emergency Stop</td>
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<tr>
<td>![Hot Surface]</td>
<td>Hot Surface</td>
<td>![Fuel and Oil Mixture]</td>
<td>Fuel and Oil Mixture</td>
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</table>
| ![AVOID KICKOUT] | AVOID KICKOUT
Keep Bystanders At Least 15 m (50 ft.) Away | ![Beware Thrown Objects] | Beware Thrown Objects
Wear Eye Protection |
| ![DO NOT Allow Flames or Sparks Near Fuel] | DO NOT Allow Flames or Sparks Near Fuel          | ![Ignition ON / OFF] | Ignition ON / OFF                                 |
| ![DO NOT Smoke Near Fuel] | DO NOT Smoke Near Fuel                             | ![Primer Bulb] | Primer Bulb                                       |
### Choke Control

<table>
<thead>
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<th>Description</th>
<th>Symbol</th>
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<td><img src="symbol.png" alt="Choke Open" /></td>
<td><strong>&quot;RUN&quot; Position</strong> (Choke Open)</td>
<td><img src="symbol.png" alt="Choke Closed" /></td>
<td><strong>&quot;COLD START&quot; Position</strong> (Choke Closed)</td>
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- Keep Feet Away From Blade
- Rotating Cutting Attachment
- Keep Bystanders and Helpers Away 15 m (50 ft.)
- Thrown Objects
- Direction of Blade

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**LOOK BEFORE YOU PUMP!**

Ethanol Percentage

- 0% - 10%
- 15% - 30%
- 50% - 65%

**USE E10 FUEL**

Do not use any fuel containing greater than 10 percent ethanol (E10) in this equipment. It may cause damage or failure and is prohibited by federal law.

For details, see the "Fuel" Section of your Operators Manual.
Personal Condition and Safety Equipment

**WARNING**

*Cancer and Reproductive Harm*
www.P65Warnings.ca.gov

**WARNING**

The muffler or catalytic muffler and surrounding cover may become extremely hot. Always keep clear of exhaust and muffler area, otherwise serious personal injury may occur.

**WARNING**

*Users of this product risk injury to themselves and others if the unit is used improperly and/or safety precautions are not followed. Proper clothing and safety gear must be worn when operating unit.*

Physical Condition

Your judgment and physical dexterity may not be good:

- If you are tired or sick
- If you are taking medication
- If you have taken alcohol or drugs

Operate unit only if you are physically and mentally well.

Eye Protection

**WARNING**

- Eye protection that meets ANSI Z87.1 or CE requirements must be worn whenever you operate the unit.
- For additional safety, a full-face shield may be worn over safety glasses or goggles to provide protection from sharp branches or flying debris.
Hand Protection
Wear sturdy, no-slip, rubber work gloves to improve your grip on the handles. Gloves also provide protection against cuts and scratches, cold environments, and reduce the transmission of machine vibration to your hands.

Hearing/Ear Protection
ECHO recommends wearing personal protection whenever unit is used.

Breathing Protection
Operators who are sensitive to dust or other common airborne allergens may need to wear a dust mask to prevent inhaling these materials while operating unit. Dust masks can provide protection against dust, plant debris, and other plant matter such as pollen. Make sure the mask does not impair your vision, and replace the mask as needed to prevent air restrictions.

Proper Clothing
Wear snug-fitting, durable clothing:
• Pants should have long legs, shirts should have long sleeves.
• DO NOT WEAR SHORTS.
• DO NOT WEAR TIES, SCARVES, JEWELRY, or clothing with loose or hanging items that could become entangled in moving parts or surrounding growth.
• Keep clothing buttoned or zipped, and keep shirt tails tucked in.
• Wear sturdy work shoes with nonskid rubber soles:
• DO NOT WEAR OPEN TOED SHOES.
• DO NOT OPERATE UNIT BAREFOOTED.

Keep long hair away from engine and air intake. Retain hair with cap or net.

Heavy protective clothing can increase operator fatigue, which may lead to heat stroke. Schedule heavy work for early morning or late afternoon hours when temperatures are cooler.
The components of this machine generate an electromagnetic field during operation, which may interfere with some pacemakers. To reduce the risk of serious or fatal injury, persons with pacemakers should consult with their physician and the pacemaker manufacturer before operating this machine. In the absence of such information, ECHO does not recommend the use of this machine by anyone who has a pacemaker.

Extended Operation / Extreme Conditions

Prolonged exposure to cold and/or vibration may result in injury. Read and follow all safety and operation instructions to minimize risk of injury. Failure to follow instructions may result in painful wrist/hand/arm injuries.

It is believed that a condition called Raynaud's Phenomenon, which affects the fingers of certain individuals, may be brought about by exposure to vibration and cold. Exposure to vibration and cold may cause tingling and burning sensations, followed by loss of color and numbness in the fingers. The following precautions are strongly recommended, because the minimum exposure, which might trigger the ailment, is unknown.

- Keep your body warm, especially the head, neck, feet, ankles, hands, and wrists.
- Maintain good blood circulation by performing vigorous arm exercises during frequent work breaks, and also by not smoking.
- Limit the hours of operation. Try to fill each day with jobs where operating the unit or other hand-held power equipment is not required.
- If you experience discomfort, redness, and swelling of the fingers followed by whitening and loss of feeling, consult your physician before further exposing yourself to cold and vibration.
Repetitive Stress Injuries (RSI)

It is believed that overusing the muscles and tendons of the fingers, hands, arms, and shoulders may cause soreness, swelling, numbness, weakness, and extreme pain in those areas. Certain repetitive hand activities may put you at a high risk for developing a Repetitive Stress Injury (RSI). An extreme RSI condition is Carpal Tunnel Syndrome (CTS), which could occur when your wrist swells and squeezes a vital nerve that runs through the area. Some believe that prolonged exposure to vibration may contribute to CTS. CTS can cause severe pain for months or even years.

To reduce the risk of RSI/CTS, do the following:

- Avoid using your wrist in a bent, extended, or twisted position. Instead try to maintain a straight wrist position. Also, when grasping, use your whole hand, not just the thumb and index finger.
- Take periodic breaks to minimize repetition and rest your hands.
- Reduce the speed and force with which you do the repetitive movement.
- Do exercises to strengthen the hand and arm muscles.
- Immediately stop using all power equipment and consult a doctor if you feel tingling, numbness, or pain in the fingers, hands, wrists, or arms. The sooner RSI/CTS is diagnosed, the more likely permanent nerve and muscle damage can be prevented.

DANGER

All over head electrical conductors and communications wires can have electricity flow with high voltages. This unit is not insulated against electrical current. Never touch wires directly or indirectly, otherwise serious injury or death may result.
Do not operate this product indoors or in inadequately ventilated areas. Engine exhaust contains poisonous emissions and can cause serious injury or death.

Read Manuals
- Provide all users of this equipment with literature for instructions on safe operation.

Clear The Work Area
- Always clear the work area of foreign objects, and check for any hidden hazards. spectators and fellow workers must be warned, and children and animals prevented from coming nearer than 50 ft. (15 m) while the unit is in use.

Keep A Firm Grip
- Always hold throttle handle and support handle with thumbs and fingers tightly encircling the handles.

Keep A Solid Stance
- Maintain footing and balance at all times. Do not stand on slippery, uneven or unstable surfaces. Do not work in odd positions or on ladders. Do not over reach.

Avoid Hot Surfaces
- Keep exhaust area clear of flammable debris. Avoid contact during and immediately after operation.

Equipment
Use only approved attachments. Serious injury may result from the use of a non-approved attachment combination. ECHO INC. will not be responsible for the failure of cutting devices, attachments or accessories which have not been tested and approved by ECHO INC. Read and comply with all safety instructions.
- Check unit for loose or missing nuts, bolts, and screws. Tighten or replace as needed.
Inspect shield for damage and ensure that shield is properly installed, and that the cut-off knife is securely in place. Replace if either is damaged or missing.

Check that the cutting attachment is firmly attached and in safe operating condition.

Assure that throttle trigger, throttle trigger lockout, and stop switch all work properly.

Check that handle and harness (if included) are adjusted for safe, comfortable operation. See Assembly Section for proper adjustment.

Moving parts can amputate fingers or cause severe injuries. Keep hands, clothing and loose objects away from all openings.

ALWAYS stop engine, disconnect spark plug, and make sure all moving parts have come to a complete stop before assembling unit, removing obstructions, clearing debris, or servicing unit.

Do not connect spark plug lead to spark plug until unit is ready for use.

DO NOT start or operate unit unless all guards and protective covers are properly assembled to unit.

NEVER reach into any opening while the engine is running. Moving parts may not be visible through openings.

Position wiring safely to prevent snagging, separation of connectors, or breakage during operation. Gather excess wire, and secure with wiring clamp if provided on equipment, or tuck behind the air filter area. Do not place wiring directly against hot engine components.

Check wiring and connectors for nicks, cuts, exposed wire, or other damage, and repair or replace as needed. Exposed wire or connectors can cause shocks, sparks, and risk of fire or explosion, resulting in serious injury.

Check wire terminals for secure connections.
WARNING

Periodically check fuel system (fuel lines, vent, grommet, fuel tank, and fuel cap) for leaks especially if the unit is dropped. If damage or leaks are found, do not use unit, otherwise serious personal injury or property damage may occur. Have unit repaired by an authorized servicing dealer before using.

EMISSION CONTROL (EXHAUST & EVAPORATIVE)

CARB And EPA Emissions Control Information

The emission control system for the engine is EM (engine modification) and, if the second to last character of the Engine Family on the Emission Control Information label (sample below) is “B”, “C”, “K”, or “T”, the emission control system is EM and TWC (3-way catalyst). The fuel tank/fuel line emission control system is EVAP (evaporative emissions). Evaporative emissions for California models are only applicable to fuel tanks and fuel feed lines.

An Emission Control Label is located on the engine. (This is an EXAMPLE ONLY, information on label varies by engine FAMILY).

Product Emission Durability (Emission Compliance Period)

The 50 or 300 hour emission compliance period is the time span selected by the manufacturer certifying the engine emissions output meets applicable emissions regulations, provided that approved maintenance procedures are followed as listed in the Maintenance Section of this manual.
DESCRIPTION

Locate the safety decal(s) on your unit. Make sure the decal(s) 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. Safety label is for example only. Your label may appear slightly different.
1. Power Head
2. Throttle Handle - For Right Hand
3. Throttle Trigger Lockout
4. Stop Switch
5. Support Handle - For Left Hand
6. Drive Shaft Assembly
7. Nylon Cutter Head
8. Cut-Off Knife
9. Debris Shield with Cut-Off Knife
10. Throttle Trigger
11. Spark Plug
12. Top Guard
13. Recoil Starter Handle
14. Spark Arrester Muffler or Spark Arrester Muffler with Catalyst
15. Fuel Tank
16. Fuel Tank Cap
17. Choke
18. Air Cleaner
19. Purge Bulb

**CONTENTS**

The ECHO product you purchased has been factory pre-assembled for your convenience. Due to packaging restrictions, some assembly may be necessary.

After opening the carton, check for damage. Immediately notify your retailer or ECHO Dealer of damaged or missing parts. Use the contents list to check for missing parts.

1. Power Head / Drive Shaft Assembly
2. Quick Start Guide
3. Warranty Statement
ASSEMBLY

Support Handle Installation

Note: Label shows minimum spacing for support handle location.

1. If necessary, position support handle for comfortable operation and securely tighten screws.

OPERATION

WARNING

Moving parts can amputate fingers or cause severe injuries. Keep hands, clothing and loose objects away from all openings. Always stop engine, disconnect spark plug, and make sure all moving parts have come to a complete stop before removing obstructions, clearing debris, or servicing unit.

WARNING

Engine exhaust IS HOT, and contains Carbon Monoxide (CO), a poison gas. Breathing CO can cause unconsciousness, serious injury, or death. Exhaust can cause serious burns. ALWAYS position unit so that exhaust is directed away from your face and body.

WARNING

Operation of this equipment may create sparks that can start fires around dry vegetation. This unit is equipped with a spark arrestingor to prevent discharge of hot particles from the engine. Metal cutters can also create sparks if the cutter strikes rocks, metal, or other hard objects. Contact local fire authorities for laws or regulations regarding fire prevention requirements.
Operation With Blades

**WARNING**

*Metal blades are very sharp and can cause severe injuries, even if engine is off and blades are not moving. Avoid contact with blades. Wear gloves to protect hands.*

**WARNING**

*Blade use demands specific brush cutter configuration. Operation without specified shield, barrier bar or U-handle, and harness can result in serious personal injury. Follow installation instructions.*

<table>
<thead>
<tr>
<th>Pro Maxi-Cut Grass/Weed Blade</th>
<th>Tri-Cut Grass/Weed Blade</th>
<th>Metal Grass / Weed Blade</th>
<th>Metal Brush / Clearing Blades</th>
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<tbody>
<tr>
<td>Support Handle, with or without Barrier Bar</td>
<td>U-Handle or Support Handle with Barrier Bar</td>
<td></td>
<td>U-handle*</td>
</tr>
<tr>
<td>Shield with cutoff knife</td>
<td>Shield without cutoff knife</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Harness</td>
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<td></td>
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<td>Upper/Lower Blade Plates</td>
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<td>Hex Nut</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>New Cotter Pin</td>
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</tbody>
</table>

*ANSI standards require brush cutters be equipped with a barrier bar or restrictive harness. U-Handle ensures a higher safety factor.*

**WARNING**

*Do Not install blades on GT (Curved Shaft) model trimmers.*

- Arbor diameter of upper blade plate must match arbor diameter of blades.
- A new cotter pin is required each time a blade is installed.
- Brushcutters over 7.5 kg (16.5 lbs.) dry weight (without fuel) require a double shoulder harness.
Note: The barrier bar is used to restrict rearward movement of the unit. The barrier bar is not a handle and should not be gripped when using or carrying the unit.

**Blade Selection**

**WARNING**

*The type of blade used MUST be matched to the type and size of material cut. An improper or dull blade can cause serious personal injury. Blades MUST be sharp. Dull blades increase the chance of kick-out and injury to yourself and bystanders. Never use an edging blade, circular saw blade, or any other type of unapproved blade.*

3-Tooth Grass/Weed Blades may be used wherever the nylon line head is used. DO NOT use this blade for heavy weeds or brush.

8 Tooth Weed/Grass Blade is designed for grass, garden debris and thick weeds up to 19 mm (0.75 in.) diameter. DO NOT use this blade for brush or heavy woody growth.

80 Tooth Brush Blade is designed for cutting brush and woody growth up to 13 mm (0.5 in.) diameter.

22 Tooth Clearing Blade is designed for dense thickets and saplings up to 64 mm (2.5 in.) diameter.
A trimmer-brushcutter with a metal blade can cause serious injuries if handled improperly.

Always use extreme care when carrying or handling the equipment to avoid contact with the cutting edges of the blade. Use the optional blade cover when unit is not in use.

Keep blades in protective packaging until ready to install. Store blades safely after removal to prevent injury from accidental contact.

Use blade protectors to protect blade teeth during unit transportation.

Use Shoulder/Waist Harness

Use of the shoulder/waist harness is recommended for ALL Trimmer/brushcutter use, not just blade operation. The shoulder/waist harness when used in a trimming operation with nylon line head suspends the trimmer from the operator's shoulder and reduces operator fatigue.

During blade operation, the same fatigue reduction is achieved. Safety to the operator is also enhanced by reducing the possibility of blade contact with the operator's hands and feet by restricting trimmer movement.

Make sure the warning sign on the back of the shoulder harness can be read easily.

Note: In case of Emergency, disconnect the trimmer from the harness.
OPERATION  SRM-225

Fuel

**WARNING**

Diesel fuels and alternative fuels, such as E-15 (15% ethanol), E-85 (85% ethanol) or any fuels not meeting ECHO requirements are NOT approved for use in ECHO 2-stroke gasoline engines. Use of diesel or alternative fuels may cause performance problems, loss of power, overheating, fuel vapor lock, and unintended machine operation, including, but not limited to, improper clutch engagement. Diesel or alternative fuels may also cause premature deterioration of fuel lines, gaskets, carburetors and other engine components.

**Fuel Requirements**

**Gasoline** - Use 89 Octane [R+M/2] (mid grade or higher) gasoline known to be good quality. Gasoline may contain up to 10% Ethanol (grain alcohol) or 15% MTBE (methyl tertiary-butyl ether). Gasoline containing methanol (wood alcohol) is NOT approved. Use of ECHO branded fuel is recommended to extend engine life in all air-cooled 2-stroke and 2/4-stroke hybrid engines.

**Two Stroke Oil** - A two-stroke engine oil, such as ECHO branded 2-stroke oils, meeting ISO-L-EGD (ISO/CD 13738) and J.A.S.O. FD Standards must be used. ECHO branded 2-stroke oils meet these standards. Engine problems due to inadequate lubrication caused by failure to use an ISO-L-EGD (ISO/CD 13738) and J.A.S.O. M345-FD certified oil will void the two-stroke engine warranty.

**WARNING**

2-Stroke engine oil contains petroleum distillates and other additives that may be harmful if swallowed. Heated oil can release vapors that can cause flash fire, or ignite with explosive force. Read and follow the oil manufacturer’s instructions, and observe all safety warnings and precautions for handling flammable liquids. For more detailed safety and first aid information, visit www.echo-usa.com for a copy of the Material Safety Data Sheet.

◆ KEEP OUT OF REACH OF CHILDREN.
◆ If swallowed, do not induce vomiting. CALL PHYSICIAN OR A POISON CONTROL CENTER IMMEDIATELY.
◆ WEAR SAFETY GLASSES when mixing or handling.
◆ AVOID repeated or prolonged skin contact.
◆ AVOID inhaling oil mists or vapors.

**NOTICE**

*ECHO branded 2-stroke oils may be mixed at 50:1 ratio for application in all ECHO engines sold in the past regardless of ratio specified in those manuals.*

Handling Fuel

**DANGER**

*Fuel is VERY flammable. Use extreme care when mixing, storing or handling, or serious personal injury may result.*
◆ Use an approved fuel container. Mark fuel containers as containing 2-stroke mixture fuel.
◆ DO NOT smoke near fuel.
◆ DO NOT allow flames or sparks near fuel.
◆ Fuel tanks/cans may be under pressure. Always loosen fuel caps slowly allowing pressure to equalize.
◆ NEVER refuel a unit when the engine is HOT or RUNNING!
◆ DO NOT fill fuel tanks indoors. ALWAYS fill fuel tanks outdoors over bare ground.
◆ DO NOT overfill fuel tank. Wipe up spills immediately.
◆ Securely tighten fuel tank cap and close fuel container after refueling.
◆ Inspect for fuel leakage. If fuel leakage is found, do not start or operate unit until leakage is repaired.
◆ Move at least 3 m (10 ft.) from refueling location before starting the engine.

**DANGER**

*Gasoline vapor is heavier than air, and can travel along the ground to nearby sources of ignition such as electrical motors, pilot lights, and hot or running engines. Vapors ignited by an ignition source can flash back to the fuel container, resulting in an explosion, fire, serious or fatal injuries, and extensive property damage.*
Mixing Instructions

1. Fill an approved fuel container with half of the required amount of gasoline.
2. Add the proper amount of 2-stroke oil to gasoline.
3. Close container and shake to mix oil with gasoline.
4. Add remaining gasoline, close fuel container, and remix.

Spilled fuel is a leading cause of hydrocarbon emissions. Some states may require the use of automatic fuel shut-off containers to reduce fuel spillage.

Storage - Fuel storage laws vary by locality. Contact your local government for the laws affecting your area. As a precaution, store fuel in an approved, airtight container. Store in a well-ventilated, unoccupied building, away from sparks and flames.

- Empty the fuel tank prior to storing the unit. Return unused fuel to an approved fuel storage container.

<table>
<thead>
<tr>
<th>Fuel to Oil Mix – 50:1 Ratio</th>
</tr>
</thead>
<tbody>
<tr>
<td>US</td>
</tr>
<tr>
<td>Gas</td>
</tr>
<tr>
<td>gal.</td>
</tr>
<tr>
<td>1</td>
</tr>
<tr>
<td>2</td>
</tr>
<tr>
<td>5</td>
</tr>
</tbody>
</table>

Used oil and gasoline, and soiled towels are hazardous waste materials. Disposal laws vary by locality.
Starting Cold Engine

**WARNING**

*The attachment will operate immediately when the engine starts, and could result in possible serious injury. Keep movable parts of the attachment away from objects that could become entangled or thrown, and surfaces that could cause loss of control.*

1. **Stop Switch**
   - Move stop switch (A) away from the STOP position.

2. **Choke**
   - Move choke lever (B) to COLD START position ( ).

3. **Purge Bulb**
   - Pump purge bulb (C) until fuel is visible and flows freely in the clear fuel tank return line. Pump bulb an additional 4 or 5 times.

Note: Energy is stored in the starter spring each time the handle/rope is pulled. Generally, two to six pulls, using light pulling force, will store enough energy to engage the starter and spin the engine. Do not pull the rope out to end stop.
4. **Recoil Starter**
   Lay the unit on a flat area and keep movable attachment parts clear of all obstacles. Firmly grasp throttle handle with left hand and fully depress throttle trigger to wide open position. Gently pull recoil starter handle/rope (D) until engine fires or 2 to 3 engine engagements.

5. **Choke**
   After engine fires, or 2 to 3 engine engagements, move choke lever (B) to the Run position ( ). Firmly grasp throttle handle with left hand and fully depress throttle trigger to wide open position. Gently pull starter handle/rope until engine starts and runs. Release throttle trigger and allow unit to warm up at idle for several minutes.

   Note: If engine does not start with choke in “RUN” position after 2-3 engine engagements, repeat instructions 2 - 5.

6. **Throttle Trigger**
   After engine warm-up, grip throttle handle and support handle. Gradually depress throttle trigger to increase engine RPM to operating speed.

---

**Starting Warm Engine**

The starting procedure is the same as Cold Start except DO NOT close the choke, and do not depress throttle trigger to wide open position.

---

**WARNING**

*The attachment should not move at idle, otherwise serious personal injury may result.*

Note: If attachment moves, readjust carburetor according to “Carburetor Adjustment” instructions in this manual or see your ECHO Dealer.
1. **Stop Switch**
   Move stop switch (A) away from the STOP position.

2. **Purge Bulb**
   Pump purge bulb (C) until fuel is visible and flows freely in the clear fuel tank return line. Pump bulb an additional 4 or 5 times.
   
   Note: Energy is stored in the starter spring each time the handle/rope is pulled. Generally two to six pulls, using light pulling force, will store enough energy to engage the starter and spin the engine. Do not pull the rope out to end stop.

3. **Recoil Starter**
   Lay the unit on a flat area and keep movable attachment parts clear of all obstacles. Firmly grip throttle handle with left hand.
   Gently pull recoil starter handle/rope (D) until engine fires.
   
   Note: If engine does not start after 2-3 engine engagements, use Cold Start Procedure.
OPERATION  

SRM-225

Stopping Engine

**WARNING**

*If engine does not stop when stop switch is moved to STOP position, close choke - COLD START position - to stall engine. Have your dealer repair stop switch before using unit again.*

1. **Throttle**
   - Release throttle and allow engine to return to idle before shutting off engine.

2. **Stop Switch**
   - Move stop switch (A) to STOP position.

Applications

Nylon line heads may be used for trimming, scything, edging, and scalping of grass and light weeds.

**Trimming**

Feed the spinning line into the material to be cut. Tilt the line head to one side to direct cutting debris away from you:

- Model SRM/PAS/SB/TX/C (Straight shaft, counter-clockwise line head rotation) - Tilt the cutting head down on the right side (muffler side) while cutting to direct cutting debris away from operator. Feed the line gradually into the material you wish to cut, avoiding contact with fences or other barriers.

**Scything**

Scything - Swing the cutting head in a level arc, gradually feeding the line into the material being cut. Move forward with each arc to cut a swath. Width of cutting swath depends on arc. Use a larger arc for a wider swath, or a smaller arc for a narrow swath. Keep line head tilted to direct cutting debris forward or away from you.
Operating Techniques

- Debris flows in direction of line head rotation. Change line head position to assure debris flow is directed away from operator.
- Keep cutting line away from wire fences to avoid entanglement.
- Operate trimmer only with cutting head below knee height.

Reaction Forces

Push or Pull - Kickback or Kickout
During normal use, operating a brushcutter with a circular metal blade can produce sudden strong reaction forces that are difficult to control. Strong reaction forces can cause a loss of balance or loss of control of the equipment, resulting in serious injury to operator and bystanders.

Understanding what causes these reactive forces may help you to avoid them, and can help you to maintain control of the equipment if you experience a sudden reaction during cutting. Reactive forces occur when the force being applied by the cutting teeth of a blade meet resistance, and some of the cutting force is directed back toward the equipment. The greater the cutting force or the amount of resistance, the greater the reactive force.

Push and Pull Forces

Push and pull forces are reactive forces that push the equipment directly toward the operator, or that pull the equipment directly away from the operator. These forces are the result of cutting on the sides of the blade. The direction of the force depends on the side of the blade being used, and the direction of blade rotation at the point of contact. The reactive force is in the opposite direction of blade rotation at the contact point, regardless of where the contact is being made. These types of reactive forces are also called “Blade Thrust.”

As shown in the illustration, a blade turning counterclockwise will cause the equipment to pull away from the operator if the point of cutting resistance is on the left side of the blade. If the point of cutting resistance is on the right side of the blade, the equipment will push back toward the operator. In both examples, the reactive force is in the opposite direction of blade rotation at the contact point where resistance occurs.
Kickout

Kickout is also a reactive force caused by resistance to cutting, but the direction of blade thrust is lateral (to the left or right of the blade), instead of forward or back toward the operator. In most cases, Push, Pull, and Kickout can be reduced or eliminated by:

- Using the correct blade for the cutting job
- Using properly sharpened blades
- Applying consistent, even force to the blade during the cut
- Avoiding obstacles and ground hazards
- Using extra care when cutting harder materials such as extremely dry brush, saplings, and small trees
- Cutting from a stable, secure position

Blade Cutting Problems

Binding - Blades may bind in the cut if dull or forced. Binding can damage blade, and result in blade breakage or injury from fragments and flying debris. If a blade binds in a cut, don’t try to get it out by applying “up and down” force to pry the cut open. Applying prying force to the blade can bend the blade, and result in blade failure and injury.

To free a blade that is bound in the cut, stop the engine, and support the trimmer or brushcutter to keep stress off the blade. Push the tree away from the entry point of the cut to open the cut, and pull the blade directly away from the cut in a straight-line motion. Use caution when releasing the tree to avoid being struck by spring-back or falling.

Inspect the blade for damage before proceeding. Sharpen teeth if dull, or replace blade if cracked, bent, missing teeth, or otherwise damaged.

To prevent binding:

- Keep blades sharp
- Avoid excessive pressure during cuts
- Don’t exceed cutting capacity of blade
- Don’t use blades with damaged or missing cutting teeth
- Don’t rock blades in cut
MAINTENANCE

WARNING

Moving parts can amputate fingers or cause severe injuries. Keep hands, clothing and loose objects away from all openings. Always stop engine, disconnect spark plug, and make sure all moving parts have come to a complete stop before removing obstructions, clearing debris, or servicing unit. Allow unit to cool before performing service. Wear gloves to protect hands from sharp edges and hot surfaces.

WARNING

Operating a poorly maintained unit can result in serious injuries to operator or bystanders. Always follow all maintenance instructions as written, otherwise serious personal injury may result.

Your unit is designed to provide many hours of trouble free service. Regular scheduled maintenance will help your unit achieve that goal. If you are unsure or are not equipped with the necessary tools, we recommend that you take your unit to a Servicing Dealer for maintenance. To help you decide whether you want to DO-IT-YOURSELF or have the Dealer do it, each maintenance task has been graded. If the task is not listed, see your Dealer for repairs.

Skill Levels

Level 1 = Easy to do. Common tools may be required.
Level 2 = Moderate difficulty. Some specialized tools may be required.
Level 3 = See your dealer.

Click HERE or go to http://www.echo-usa.com/products/maintenance-kit or HERE https://www.shindaiwa-usa.com/you-can.aspx

For information about maintenance kits.
### Maintenance Intervals

<table>
<thead>
<tr>
<th>COMPONENT/SYSTEM</th>
<th>MAINTENANCE PROCEDURE</th>
<th>SKILL LEVEL</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Daily or Before Use</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Air Filter</td>
<td>Inspect/Clean *</td>
<td>1</td>
</tr>
<tr>
<td>Choke Shutter</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Fuel System</td>
<td>Inspect 3</td>
<td>2</td>
</tr>
<tr>
<td>Cooling System</td>
<td>Inspect/Clean</td>
<td></td>
</tr>
<tr>
<td>Recoil Starter Rope</td>
<td>Inspect/Clean *</td>
<td>1</td>
</tr>
<tr>
<td>Screws/Nuts/Bolts</td>
<td>Inspect/Tighten/Replace *</td>
<td></td>
</tr>
<tr>
<td><strong>Every Refuel</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Fuel System</td>
<td>Inspect 3</td>
<td>1</td>
</tr>
<tr>
<td><strong>3 Months</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Air Filter</td>
<td>Replace *</td>
<td>1</td>
</tr>
<tr>
<td>Fuel Filter</td>
<td>Inspect *</td>
<td></td>
</tr>
<tr>
<td>Fuel Cap Gasket</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Spark Plug</td>
<td>Inspect/Clean/Replace *</td>
<td></td>
</tr>
<tr>
<td>Muffler Spark Arrestor</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cylinder Exhaust Port</td>
<td>Inspect/Clean/De-carbon</td>
<td>2</td>
</tr>
<tr>
<td>Drive Shaft (Flex Cable Models)</td>
<td>Grease 1</td>
<td></td>
</tr>
<tr>
<td>Gear Housing (Some Models)</td>
<td>Grease 2</td>
<td></td>
</tr>
<tr>
<td><strong>Yearly</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Fuel Filter</td>
<td>Inspect/Replace *</td>
<td>1</td>
</tr>
<tr>
<td>Fuel Cap Gasket</td>
<td>Replace *</td>
<td></td>
</tr>
</tbody>
</table>

**IMPORTANT NOTE** - Time intervals shown are maximum. Actual use and your experience will determine the frequency of required maintenance.

**MAINTENANCE PROCEDURE NOTES:**

1. Apply lithium based grease every 25 hours of use.
2. Apply lithium based grease every 50 hours of use.
3. Low evaporative fuel tanks DO NOT require regular maintenance to maintain emission integrity.

* Replacement is recommended based on the finding of damage or wear during inspection.
Air Filter

Level 1.

Parts Required: Tune-Up Kit

1. Close choke (COLD START [ ] position). This prevents dirt from entering the carburetor throat when the air filter is removed. Brush accumulated dirt from air cleaner area.

2. Remove air filter cover. Brush dirt from inside cover.

3. Replace filter if it is damaged, fuel soaked, very dirty, or the rubber sealing edges are deformed.
   - Lightly brush debris from filter.
   - Soak heavily soiled filters in water/detergent solution to loosen dirt, then brush lightly.
   - Rinse with clean water and allow to dry completely before reuse.

4. Install air filter in air filter case.

5. Install air filter cover.
Fuel Filter

Level 1.

Parts Required: TUNE UP KIT.

**DANGER**

Fuel is VERY flammable. Use extreme care when mixing, storing or handling, or serious personal injury may result.

1. Use a clean rag to remove loose dirt from around fuel cap and empty fuel tank.

**NOTICE**

Do not damage fuel line while removing fuel filter from tank or line.

2. Pull the fuel filter from the tank.

3. Do not remove the wire coil clamp to remove the fuel filter. Pinch the fuel filter with the fingers on one hand and the fuel line with the other hand. Pull and twist slightly to separate.

4. Install the new filter with the reverse action.

Note: Federal EPA regulations require all model year 2012 and later gasoline powered engines produced for sale in the United States to be equipped with a special low permeation fuel supply hose between the carburetor and fuel tank. When servicing model year 2012 and later equipment, only fuel supply hoses certified by EPA can be used to replace the original equipment supply hose. Fines up to $37,500 may be enforced for using an un-certified replacement part.
Spark Plug
Level 2.

Parts Required:  Tune-Up Kit

**NOTICE**

*Use only NGK BPM8Y spark plug (BPMR8Y in Canada) otherwise severe engine damage may occur.*

1. Remove spark plug and check for fouling, worn and rounded center electrode.
2. Clean the plug or replace with a new one. DO NOT sand blast to clean. Remaining sand will damage engine.
3. Adjust spark plug gap by bending outer electrode.
4. Tighten spark plug to 150-170 kgf·cm (130-150 in·lbf).

Cooling System
Level 2.

**NOTICE**

*To maintain proper engine operating temperatures, cooling air must pass freely through the cylinder fin area. This flow of air carries combustion heat away from the engine.*

Overheating and engine seizure can occur when:

- Air intakes are blocked, preventing cooling air from reaching the cylinder.
- Dust and grass build up on the outside of the cylinder. This build up insulates the engine and prevents the heat from leaving.
Removal of cooling passage blockages or cleaning of cooling fins is considered “Normal Maintenance.” Any failure attributed to lack of maintenance is not warranted.

1. Remove spark plug lead.
2. Close choke (COLD START position). This prevents dirt from entering the carburetor throat when the air filter is removed. Remove air cleaner cover (A).
3. Remove engine cover (B).

**NOTICE**

DO NOT use a metal scraper to remove dirt from the cylinder fins.

4. Use a brush to remove dirt from the cylinder fins.
5. Remove ignition wires from clip for cleaning.
6. Remove grass and leaves from the grid between the recoil starter and fuel tank.
7. Assemble components in reverse order.

Exhaust System

Spark Arrestor Screen

Level 2.

Parts Required: Spark Arrestor Screen, Gasket

1. Remove spark plug lead and engine cover.
2. Place piston at Top Dead Center (TDC) to prevent carbon/dirt from entering cylinder.
3. Remove spark arrestor screen cover (C), gaskets (D), (E), and screen (F), from muffler body.
4. Clean carbon deposits from muffler components.

Note: When cleaning carbon deposit, be careful not to damage the catalytic element inside muffler.

5. Replace screen if it is cracked, plugged, or has holes burned through.
6. Assemble components in reverse order.
Exhaust Port Cleaning
Level 2.

Parts Required: As needed: Heat Shield

1. Remove spark plug lead from spark plug, and remove engine cover.
2. Place piston at top dead center. Remove muffler (A) and heat shield (B).
3. Use a wood or plastic scraping tool to clean deposits from cylinder exhaust port (C).

Never use a metal tool to scrape carbon from the exhaust port. Do not scratch the cylinder or piston when cleaning the exhaust port. Do not allow carbon particles to enter the cylinder.

4. Inspect heat shield, and replace if damaged.
5. Install heat shield and muffler.
6. Tighten muffler mounting bolts (or nuts) to 90-110 kgf•cm (80-95 in•lb).
7. Install engine cover and attach spark plug lead.
8. Start engine, and warm to operating temperature.
9. Stop engine, and re-tighten mounting bolts (or nuts) to specifications.
Carburetor Adjustment

Level 2.

Engine Break-In

New engines must be operated a minimum duration of two tanks of fuel break-in before carburetor adjustments can be made. During the break-in period your engine performance will increase and exhaust emissions will stabilize. Idle speed can be adjusted as required.

High Altitude Operation

This engine has been factory adjusted to maintain satisfactory starting and durability performance up to 330 m (1100 ft.) above sea level (ASL) (96.0 kPa). To maintain proper engine operation and emission compliance above 330 m (1100 ft.) ASL the carburetor may need to be adjusted by an authorized ECHO service dealer.

NOTICE

If the engine is adjusted for operation above 330 m (1100 ft.) ASL, the carburetor must be re-adjusted when operating the engine below 330 m (1100 ft.) ASL, otherwise severe engine damage may result.

Note: Every unit is run at the factory and the carburetor is set in compliance with emission regulations. Carburetor adjustments, other than idle speed, must be performed by an authorized ECHO dealer.

1. Check idle speed and reset if necessary. If a tachometer is available, idle speed screw (A) should be set to the specifications found on “Specifications” page of this manual. Turn idle screw (A) clockwise to increase idle speed; counterclockwise to decrease idle speed.
When carburetor adjustment is completed, the cutting attachment should not move at idle, otherwise serious personal injury may result.

Lubrication

Level 1.

Parts Required: Lithium Based Grease.

Gear Case

**NOTICE**

Gear cases without grease plug (A) do not require lubrication.

1. Clean all loose debris from gear case.
2. Remove plug (A) and check level of grease.
3. Add grease if necessary. DO NOT over-fill.

Drive Shaft (flex cable only)

1. Loosen screw (B) and remove locating screw (C). Pull gear case and shield from drive shaft housing.
2. Pull flexible cable (D) from the drive shaft housing, wipe clean and re-coat with 15 ml (0.5 oz.) of grease.

3. Slide the flexible cable (D) back in the drive housing. DO NOT get dirt on the flex cable.

4. Install the gear housing and shield assembly.

Nylon Line Replacement

**CAUTION**

*Wear gloves or personal injury may result:*

- **Cutoff knife is sharp.**
- **Gearcase and surrounding area may be hot.**

1. Cut one piece of line to recommended length.
   - 2.0 mm (0.080 in.) diameter 6 m (20 ft.),
   - 2.4 mm (0.095 in.) diameter 6 m (20 ft.).

2. Align arrows on top of knob with openings in eyelets.

3. Insert one end of trimmer line into an eyelet, and push line equal distance through trimmer head.
4. Hold trimmer head while turning knob clockwise to wind line onto spool until about 13 cm (5 in.) of each line remains exposed.

Trimmer head is now fully loaded and ready for operation.

**NOTICE**

When the wear indicators located at the bottom of the Speed-Feed® head are worn smooth, or if holes appear, replacement of the cover or the entire Speed-Feed® head is required.

**Sharpening Metal Blades**

Several styles of metal blades are approved for use on the Brush Cutter. The 8-tooth blade can be sharpened during normal maintenance. The clearing blade and 80-tooth blade require professional service.

Before sharpening, CLOSELY inspect blade for cracks (look at the bottom of each tooth and the center mounting hole closely), missing teeth and bending. If ANY of these problems are discovered, replace the blade.
When sharpening a blade, always remove the same amount of materials from each tooth to maintain balance. A blade that is not balanced will cause unsafe handling due to vibration and can result in blade failure.

1. File each tooth at a 30° angle a specific number of times, e.g., four strokes per tooth. Work your way around the blade until all teeth are sharp.

2. DO NOT file the ‘gullet’ (radius) of the tooth with the flat file. The radius must remain. A sharp corner will lead to a crack and blade failure.

**NOTICE**

If an electric grinder is used, use care not to overheat teeth, do not allow tips/tooth to glow red or turn blue. DO NOT place blade in cooling water. This will change the temper of the blade and could result in blade failure.

3. After sharpening teeth, check each tooth radius for evidence of a square (sharp) corner. Use the round (rat tail) file to renew the radius.
## ENGINE PROBLEM TROUBLESHOOTING CHART

<table>
<thead>
<tr>
<th>Problem</th>
<th>Check</th>
<th>Status</th>
<th>Cause</th>
<th>Remedy</th>
</tr>
</thead>
<tbody>
<tr>
<td>Engine starts hard or does not start</td>
<td>Fuel at carburetor</td>
<td>No fuel at carburetor</td>
<td>Fuel strainer or fuel line obstructed</td>
<td>Clean or replace See your dealer</td>
</tr>
<tr>
<td></td>
<td>Fuel at cylinder</td>
<td>No fuel at cylinder</td>
<td>Carburetor</td>
<td>See your dealer</td>
</tr>
<tr>
<td></td>
<td>Muffler wet with fuel</td>
<td>Muffler wet with fuel</td>
<td>Fuel mixture too rich</td>
<td>Open choke Clean or replace air filter Adjust carburetor See your dealer</td>
</tr>
<tr>
<td></td>
<td>Spark at end of plug wire</td>
<td>No spark</td>
<td>Stop switch OFF - Electrical problem - Interlock switch</td>
<td>Turn switch to ON See your dealer</td>
</tr>
<tr>
<td></td>
<td>Spark at plug</td>
<td>Incorrect gap - Covered with carbon - Fouled with fuel - Plug defective</td>
<td>Adjust to 0.65mm (0.026 in.)</td>
<td>Clean or replace plug</td>
</tr>
<tr>
<td>Engine runs, but dies or Engine does not accelerate properly</td>
<td>Air filter</td>
<td>Air filter dirty</td>
<td>Normal wear</td>
<td>Clean or replace</td>
</tr>
<tr>
<td></td>
<td>Fuel filter</td>
<td>Fuel filter dirty</td>
<td>Contaminants or residue in fuel</td>
<td>Replace filter or replace fuel</td>
</tr>
<tr>
<td></td>
<td>Fuel vent</td>
<td>Fuel vent plugged</td>
<td>Contaminated fuel</td>
<td>Clean or replace</td>
</tr>
<tr>
<td></td>
<td>Spark plug</td>
<td>Plug dirty or worn</td>
<td>Normal wear</td>
<td>Clean and adjust or replace</td>
</tr>
<tr>
<td></td>
<td>Carburetor</td>
<td>Improper adjustment</td>
<td>Vibration</td>
<td>Adjust</td>
</tr>
<tr>
<td></td>
<td>Cooling system</td>
<td>Cooling system dirty or plugged</td>
<td>Extended operation in dirty or dusty locations</td>
<td>Clean</td>
</tr>
<tr>
<td></td>
<td>Spark arrestor screen</td>
<td>Spark arrestor screen plugged</td>
<td>Normal wear</td>
<td>Replace</td>
</tr>
</tbody>
</table>
**ENGINE PROBLEM TROUBLESHOOTING CHART**

<table>
<thead>
<tr>
<th>Problem</th>
<th>Check</th>
<th>Status</th>
<th>Cause</th>
<th>Remedy</th>
</tr>
</thead>
<tbody>
<tr>
<td>Engine does not crank</td>
<td>N/A</td>
<td>N/A</td>
<td>Internal engine problem</td>
<td>See your dealer</td>
</tr>
</tbody>
</table>

---

**DANGER**

*Fuel vapors are extremely flammable and may cause fire and/or explosion. Never test for ignition spark by grounding spark plug near cylinder plug hole, otherwise serious personal injury may result.*
STORAGE

During operation the muffler or catalytic muffler and surrounding cover become hot. Always keep exhaust area clear of flammable debris during transportation or when storing, otherwise serious property damage or personal injury may result.

Long Term Storage (Over 30 Days)
Do not store your unit for a prolonged period of time (30 days or longer) without performing protective storage maintenance which includes the following:

1. Store unit in a dry, dust free place, out of the reach of children.

Do not store in enclosure where fuel fumes may accumulate or reach an open flame or spark.

2. Place the stop switch in the “OFF” position.
3. Remove accumulation of grease, oil, dirt and debris from exterior of unit.
4. Perform all periodic lubrication and services that are required.
5. Tighten all the screws and nuts.
6. Drain fuel tank completely. Press purge bulb 6-7 times to remove remaining fuel from carburetor then drain the tank again. Close choke, start and run the engine until it stops due to lack of fuel.
7. Allow engine to cool. Remove the spark plug lead from the spark plug. Remove the spark plug. Pour 7 cc (0.25 oz.) of fresh, clean, two-stroke engine oil into the cylinder through the spark plug hole.
8. Pull the recoil starter handle 2-3 times to distribute the oil inside the engine.
9. Observe the piston location through the spark plug hole. Pull the recoil handle slowly until the piston reaches the top of its travel and leave it there.
10. Install the spark plug. Connect the spark plug lead to the spark plug.
<table>
<thead>
<tr>
<th>SPECIFICATIONS</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>MODEL</strong></td>
<td>SRM-225</td>
</tr>
<tr>
<td>Length without cutter head</td>
<td>1795 mm (70.7 in.)</td>
</tr>
<tr>
<td>Width</td>
<td>256 mm (10.1 in.)</td>
</tr>
<tr>
<td>Height</td>
<td>329 mm (13.0 in.)</td>
</tr>
<tr>
<td>Weight (dry) without cutter head</td>
<td>5.1 kg (11.2 lb.)</td>
</tr>
<tr>
<td>Engine Type</td>
<td>Air cooled, two-stroke, single cylinder gasoline engine</td>
</tr>
<tr>
<td>Bore</td>
<td>32.2 mm (1.27 in.)</td>
</tr>
<tr>
<td>Stroke</td>
<td>26.0 mm (1.02 in.)</td>
</tr>
<tr>
<td>Displacement</td>
<td>21.2 cm³ (1.29 in.³)</td>
</tr>
<tr>
<td>Exhaust</td>
<td>Spark arrestor muffler or spark arrestor muffler with catalyst</td>
</tr>
<tr>
<td>Carburetor</td>
<td>Diaphragm w/purge pump</td>
</tr>
<tr>
<td>Ignition System</td>
<td>Flywheel magneto, capacitor discharge ignition type</td>
</tr>
<tr>
<td>Spark Plug</td>
<td>NGK BPM8Y (BPMR8Y in Canada) Gap 0.65 mm (0.026 in.)</td>
</tr>
<tr>
<td>Fuel</td>
<td>Mixed (Gasoline and Two-stroke Oil)</td>
</tr>
<tr>
<td>Gasoline/Oil Ratio</td>
<td>50 : 1</td>
</tr>
<tr>
<td>Gasoline</td>
<td>Use 89 Octane unleaded. Do not use fuel containing methyl alcohol, more than 10% ethyl alcohol or 15% MTBE. Do not use alternative fuels such as E15 or E85.</td>
</tr>
<tr>
<td>Fuel Tank Capacity</td>
<td>0.42 l (14.2 US fl. oz.)</td>
</tr>
<tr>
<td>Starter System</td>
<td>Automatic Rewind Starter</td>
</tr>
<tr>
<td>Clutch</td>
<td>Centrifugal Type</td>
</tr>
<tr>
<td>Vibration Reduction Systems</td>
<td>Rubber cushion on engine mount</td>
</tr>
<tr>
<td>Operating Rod</td>
<td>25.0 mm aluminum tube</td>
</tr>
<tr>
<td>Drive Shaft</td>
<td>6.35 mm (0.25in.) flexible shaft</td>
</tr>
<tr>
<td>Gear Case Ratio</td>
<td>1.62:1</td>
</tr>
</tbody>
</table>
PRODUCT REGISTRATION SRM-225

<table>
<thead>
<tr>
<th>MODEL</th>
<th>SRM-225</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rotating Direction</td>
<td>Counterclockwise; viewed from top</td>
</tr>
<tr>
<td>Cutter Head</td>
<td>Semi-automatic nylon line head (Speed Feed® 400)</td>
</tr>
<tr>
<td>Handle</td>
<td>Front (D-loop type with plastic grip) Rear (plastic grip with throttle trigger and switch)</td>
</tr>
<tr>
<td>Idle Speed</td>
<td>3000 RPM</td>
</tr>
<tr>
<td>Clutch Engagement Speed</td>
<td>4300 RPM</td>
</tr>
<tr>
<td>Wide Open Throttle Speed (W.O.T.)</td>
<td>10,000 RPM</td>
</tr>
</tbody>
</table>

PRODUCT REGISTRATION

Thank you for choosing ECHO Power Equipment

Please go to http://www.echo-usa.com/Warranty/Register-Your-ECHO to register your new product on-line. It's FAST and EASY! NOTE: your information will never be sold or misused by ECHO, Inc. Registering your purchase enables us to contact you in the unlikely event of a service update or product recall, and verifies your ownership for warranty consideration.

If you do not have access to the Internet, you can complete the form below and mail to:

ECHO Inc., Product Registration, PO Box 1139, Lake Zurich IL 60047.
# PRODUCT REGISTRATION CARD

**SRM-225**

**Online Option**: Register online and save a stamp! You will be added to the product database and be kept up-to-date with special offers. Simply go to www.echo-usa.com

**Option Por Internet**: Regístrate en la página web y ahorra un sello. Serás notificado sobre las últimas novedades en línea. información sobre nuevos productos ECHO y sus ofertas especiales. Simplemente visitar www.echo-usa.com

**Option En Ligne**: Enregistrez-vous en ligne et économisez un timbre ! Vous serez informé sur les nouveaux produits ECHO et les derniers tarifs spéciaux. Simplement visitez www.echo-usa.com

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Please Print: Por Favor Escriba Con Letra De Molde

| **Purchaser's Name**: Nombre del Comprador | **Nom de l'acheteur**: Nom de l'acheteur
| **Address**: Dirección | **Adresse**: Adresse
| **City**: Ciudad | **Province**: Province
| **Zip Code**: Código Postal | **Código Postal**: Código Postal
| **E-Mail Address**: Dirección De Correo Electrónico | **Courriel Électronique**: Courriel Électronique
| **Phone Number**: Número De Teléfono | **Fecha de la Compra**: Fecha de la compra
| **Date of Purchase**: Fecha de la Compra | **Date of Purchase**: Fecha de la compra
| **Where Purchased**: Nombre del Almacén donde fue Comprado | **Lieu d'achat**: Lieu d'achat

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| **Model Number**: Número del Modelo | **Número de Série**: Número de Série | **Serial Number**: Número de Série | **No. de série**: No. de série

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**Confidential**: Information provided will not be shared or sold.

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**Primary Use of Tool**: Professional: Homeowner: Rental Equip.

**Use Principal**: Profesional: Dueño de Casa: Alquiler

**Location**: Use professional: Professional: Residencial: Location

**Do you wish to receive periodic ECHO product information and special offers by e-mail?**: Yes [ ] No [ ]

**¿Desea recibir información periódica y ofertas especiales por correo electrónico sobre el producto ECHO?**: Sí [ ] No [ ]

**Did you visit the ECHO website before purchasing your product?**: Yes [ ] No [ ]

**¿Visité el sitio web de ECHO antes de comprar su producto?**: Sí [ ] No [ ]

**What factor(s) most influenced your purchase?**

- Performance: Precio: Venta
- Reliability: Experiencia: Experiencia
- Safety/Family: Marca: Garantía
- Quality: Calidad: Calidad
- Appearance: Color: Color
- Comfort: Experiencia: Experiencia
- Particularity: Marca: Marca
- Value: Gama: Gama

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ECHO INC., 400 Oakwood Rd., Lake Zurich, IL 60047
1-888-432-ECHO WWW.ECHO-USA.COM

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*Registering your purchase enables us to contact you in the unlikely event of a service update or recall notification and notifies your retailer of your ownership to aid in the event of loss. The information you provide may be used in our marketing efforts, subject to your consent. To opt out of marketing communications, please visit our website at www.echo-usa.com.*