



**Product Manual**

# **EcoLiner™ Standard Battery Powered Field Striping Machine**

**10004483**



**Proudly Made in the USA**  
**Newstripe.com • 303-364-7786**

# EcoLiner™ Standard Battery Powered Field Striping Machine

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**Thank you for purchasing the Newstripe EcoLiner™ Standard Battery Powered Field Striping Machine.**

Please read over the instructions and make sure you understand the operating procedures before using the unit.

Please check the serial number on your unit. This Manual is for units with serial number 1037072 and above only. For units with serial numbers below 1037072, please contact Newstripe for the correct product manual.



# EcoLiner™ Standard Battery Powered Field Striping Machine



## PRECAUTIONARY WARNINGS

- **PLEASE** read and understand all operation instructions as detailed in this manual. Failure to follow specified instructions may result in equipment damage or severe injury to personnel.
- **DO NOT** use latex paints from hardware stores or home improvement centers in your machine. These types of paints have binders in them that will adhere to the internal parts of the pump, causing damage. You will not be able to clean these substances from the pump. You must use good quality true water based athletic field striping paint in your machine.
- **DO NOT** use solvent based paints in this machine. Use only good quality true water based athletic field striping paint.  
**NOTE:** Damage caused by use of the wrong paint is NOT COVERED UNDER WARRANTY!
- **ALWAYS** thin the paint in accordance with the manufacturer's recommendations prior to use. Most field-marking paints must be thinned before use with the EcoLiner. These paints are typically thinned at a minimum ratio of 1:1.
- **DO NOT** use paint that has not been thinned, as it will clog your machine.
- **ALWAYS** strain the paint before use. Field marking paint often has oversized material, lumps, and debris. If not properly strained, these contaminants will be drawn into the hoses, pump, and spray nozzle or spray gun where they may restrict paint flow.
- **NEVER** perform maintenance on the machine while the system is under pressure.
- **DO NOT** use solvents to clean the system. Solvents will damage internal components. Use only warm soapy water.
- **ALWAYS** consult your Facility Safety and/or Personnel Department for specified safety protocols prior to operating this equipment.



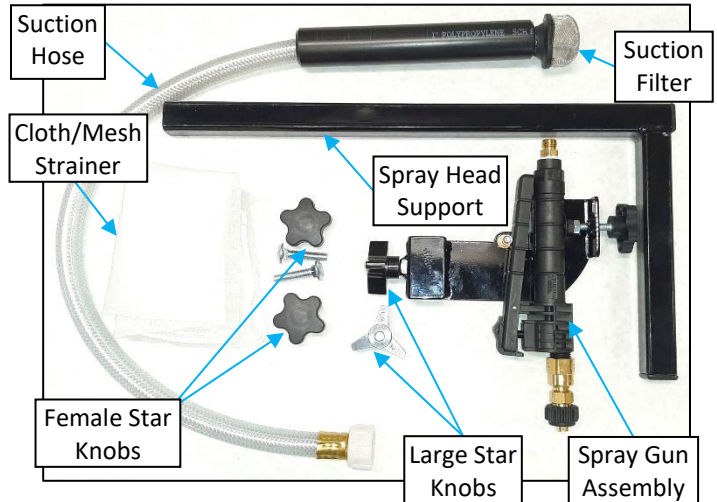
# EcoLiner™ Standard Battery Powered Field Striping Machine

## Your EcoLiner™ Standard Box Should Include:

- Chassis/Handle Assembly with Paint Hose
- Paint Pail Snap-On Lid
- Cloth/Mesh Strainer

## Parts bag containing:

- (2) Female Star Knobs
- (2) Large Star Knobs
- (2) Carriage Bolts
- Spray Head Support Arm
- Spray Gun Assembly with Gun Mount
- Paint Suction Hose
- Product Manual

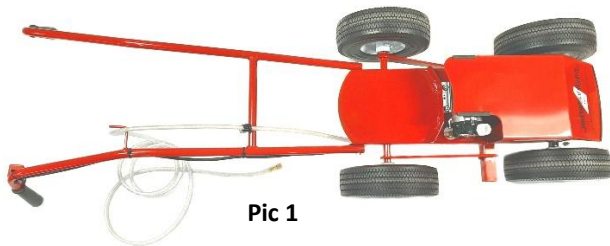


## ASSEMBLY

### Required Items and Tools

- 12V 18Ah AGM Battery. (Not Included – See Page 3 for Specifications.)
- 5-Gallon Pail (Not Included)
- Two 1/2" Combination Wrenches or Adjustable Wrenches.

1. Remove the unit and the parts from the packaging. Leave the foam wraps on the handle braces at this time. Lift up on the rear of the machine and rotate the handles out from under the chassis.
2. Remove the foam wraps from the handle braces and then position the spray hose so that it is in front of the handle. (Pic 1)



Pic 1

3. Rotate the handle to the raised position. Rotate the left handle brace to align the top hole with the hole in the handle. Insert one carriage bolt through the brace and handle from the outside. Use one female star knob to secure the brace. (Pic 2)
4. Rotate the right handle brace to align the top hole with the hole in the handle. Insert one carriage bolt through the brace and handle from the outside. Slide the paint hose clamp over the carriage bolt. Use one female star knob to secure the brace and hose. (Pic 2)



Pic 2

5. Insert the spray head support arm into the receiver tube on right side of the chassis until it stops and then secure it with one large star knob.
6. Slide the spray gun and gun mount assembly onto the upright with the spray gun toward the front of the unit. Secure the gun mount with one large star knob. Raise or lower the spray gun to adjust the line width. (Pic 3)

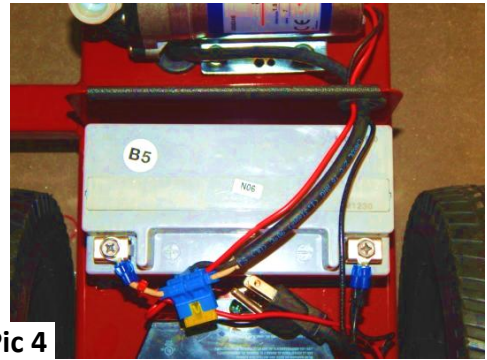


Pic 3

# EcoLiner™ Standard Battery Powered Field Striping Machine

## ASSEMBLY CONTINUED

7. Attach the spray hose to the brass fitting in the top of the spray gun and lightly tighten it with a wrench. (Pic 3)
8. Attach the suction hose to the pump inlet and hand tighten it.
9. Place one 12V 18Ah AGM Battery (Not included) in the battery tray and attach the two black wires to the negative (-) terminal and then attach the red and white wires to the positive terminal (+). (Pic 4)



Pic 4

### **12V 18Ah AGM Battery for EcoLiner Standard (Not Included):**

These are high performance sealed 12 Volt 18 Amp Hour AGM Batteries available at most auto parts stores or online. The battery dimensions are: 6-7/8" Long X 3-7/16" Wide X 6-1/8" Tall.

Some manufacturer part numbers for this battery:

Interstate Batteries (Part# FAYTX20H)

NAPA Auto Parts (Part# PSB 20BS)

O'Reilly Auto Parts (Part# GTX20BS)

Yuasa (Part# YTX20-BS)

PowerSonic (Part# PTX20-BS)

SigmatTek (Part# STX20-BS)

**NOTE:** As you look at the side of the battery with the terminals, correct orientation is, +/- (Positive Left/Negative Right). The battery part number must not have a letter "L" in it, or the terminal orientation will be incorrect.

## OPERATION

1. Always prime the EcoLiner prior to use. Fill the pail ½ full of water and secure the lid, making sure the suction filter is at the bottom of the pail. It is advisable to familiarize yourself with the equipment operation by using water the first time.
2. Turn on the pump with spray rocker switch on the handle. Allow 15-30 seconds for the pump to prime. Check for leaks and tighten any fittings as required.  
**NOTE:** The center position of the switch is off, the rear position is momentary on, and the forward position is continuous on.
3. The EcoLiner is shipped with a nozzle installed for spraying a 4" wide line. Raising or lowering the spray gun will increase or decrease the line width.
4. Unsnap the pail lid and pour properly thinned and strained paint into the pail.  
**Note:** These paints are typically thinned at a minimum ratio of 1:1. Follow the manufacturer's suggested paint thinning instructions.
5. Position the spray gun nozzle where the painted line is to begin. Press the back part of the spray rocker switch to the momentary on position for 15-30 seconds to prime the pump.
6. Engage the spray rocker switch to the desired on position when ready to paint a line. An even flow of paint should spray from the spray gun nozzle.
7. Place the spray rocker switch in the off position when you would like the machine to stop spraying.
8. To use the spray gun to paint stencils or areas by hand, place the spray rocker switch in the off position and then remove the spray gun from the gun mount. Place the spray rocker switch in the continuous on position and then depress the spray gun trigger to spray. When you are finished, return the spray rocker switch to the off position. Depress the spray gun trigger and return the spray gun to the gun mount, with the spray gun trigger in front of the post on the gun mount, so it stays depressed. (Pic 3)

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## RECHARGING THE BATTERY

**Note:** Before charging the battery, please read the Automatic Battery Charger Instructions.

1. Make sure the spray rocker switch is in the center "Off" position. All wiring may stay connected during battery charging.
2. Plug charger in any standard 110/120 volt AC outlet. The Red LED indicator on the top of the battery charger should illuminate solid when the battery is charging. If the Red LED indicator is flashing, the charger connections are incorrect, or the battery is bad.
3. When the Green LED indicator on the top of the battery charger illuminates, the battery is fully charged, and the charger is in maintain mode.



## CLEANING PROCEDURE

1. When your striping job is complete, remove the pail lid and set aside. Pull out the suction hose and place it in a clean container of water. Remove the pail of unused paint from the machine and cover it for use the next time you stripe.
2. Wipe off or rinse off the pick-up tube, foot filter, and pail lid.
3. Remove the nozzle cap, nozzle, and nozzle screen and put them in a container of water to soak.
4. Place an empty pail on the machine and add two gallons of clean soapy water. Place the suction hose in the pail on the machine.
5. Place the spray rocker switch in the forward continuous on position to flush the clean soapy water through the spray system into a catch container until it is cleared of all paint.
6. Clean the nozzle parts that have been soaking and reassemble them on spray head.
7. Clean and rinse the exterior of machine. **Pressure washing is not recommended.** Use warm soapy water once a week.

**NOTE:** Always leave some of the cleaning solution or Newstripe Pump Defender in the pump when not in use. This keeps the internal pump components lubricated. **DO NOT** run the pump without liquid. If you need to store the unit for extended periods or in freezing temperatures, run a solution of warm water and dishwashing detergent through the pump to clean out all paint. After flushing the system replace the soap water solution with Part Number 10000459, Newstripe Pump Defender (Not Included) to protect the spray system from freezing.

## MAINTENANCE

ITEM	CHECK	MAINTENANCE ACTION
Paint Pail, Hoses, and Nozzle	After every use	Clean the paint pail, hoses, and nozzle.
Pump, Hoses and Nozzle	After every use	Run soapy water through the pump for additional cleaning.
Wheels	Lubricate Weekly	Grease the wheels with bearing grease.
Handles	Monthly	Check the handles for tightness to frame.

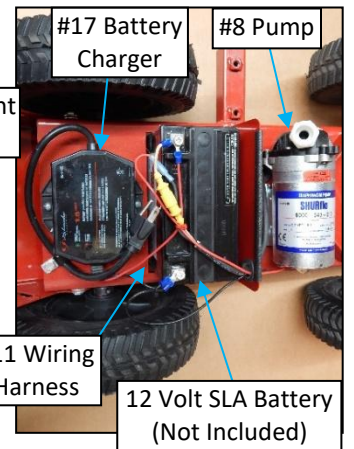
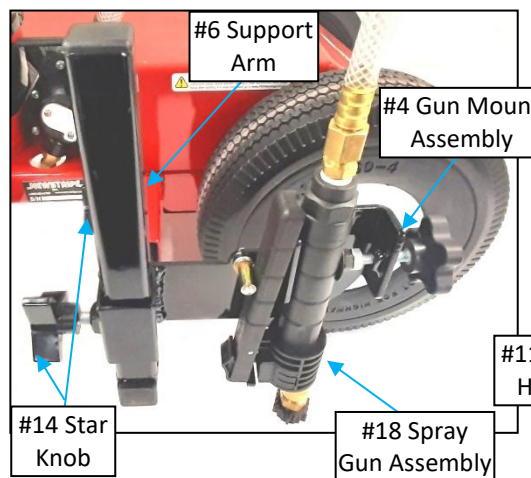
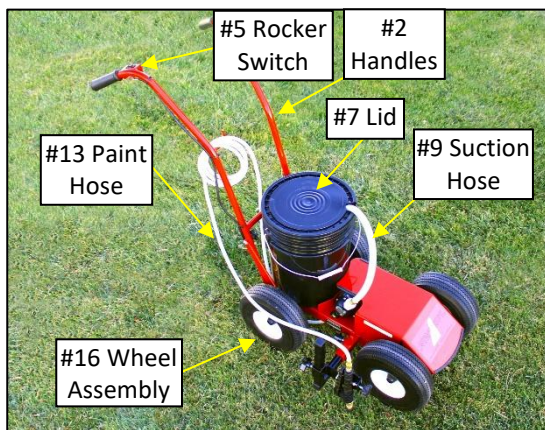


# EcoLiner™ Standard Battery Powered Field Stripping Machine

## PARTS LIST

Item	Description	Part Number
#1	Chassis	10004487
#2	Handles	10004488
#3	Handle Support Braces	10004489
#4	Gun Mount Assembly	10004443
#5	Spray Control Rocker Switch	10004474
#6	Support Arm	10004491
#7	Lid, EcoLiner Paint Pail	10004516
#8	Pump, 12 Volt Diaphragm	10004551
#9	Hose Assembly, Suction	10004498

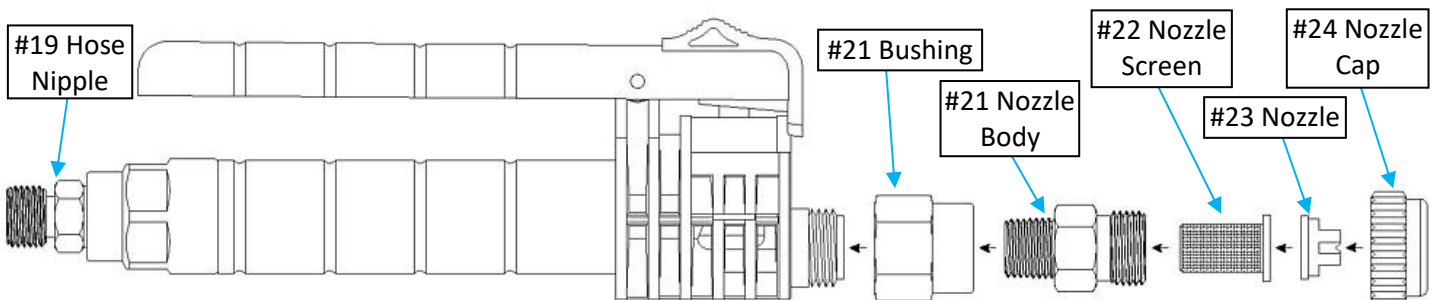
Item	Description	Part Number
#10	Suction Filter (Not Shown)	10002842
#11	Wiring Harness	10004499
#12	Fuse, ATO/ATC 20 Amp	10002836
#13	Hose Assembly, Paint	10000695
#14	Star Knob (2)	10000007
#15	Handle Female Star Knob (2)	10004480
#16	Wheel & Tire Assembly	10004705
#17	Battery Charger, 1.5 Amp	10002848
#18	Spray Gun Assy. (Includes 19-24)	10004521



## Spray Gun Assembly

Item	Description	Part Number
#19	¼" Hose Nipple	10000731
#20	¾" FSP x ¼" FPT Bushing	10002641
#21	Nozzle Body	10002306
#22	Nozzle Screen (4-Pack)	10003496
#23	8004 Nozzle	N/A
#24	Nozzle Cap (4-Pack)	10001890

Nozzles (4-Pack)	Application Description	Part Number
5002	2" - 3" Lines	10001891
8002	4" - 5" Lines (Short Turf)	10001892
8004	4" - 5" Lines	10001893
8005	4" - 5" Lines (Heavy Turf)	10003493
9505	5" - 6" Lines	10001894



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## TROUBLESHOOTING GUIDE

PROBLEM	POSSIBLE CAUSE	REMEDY
The pump will not run.	The battery is not charged. The fuse is blown. The fuse has become disconnected.	Charge the battery. Change the fuse. Check the fuse holder connection and wires.
The pump will not prime.	The pump or hoses may be restricted.	Disconnect the supply and discharge hoses and clean them. Pour hot soapy water into the inlet of the pump and let it soak. Reconnect the hoses and restart the pump.
The pump still will not prime.	The spray system was not thoroughly cleaned after the previous use.	Pour more hot soapy water into the inlet of the pump. Jog the pump by operating the toggle switch briefly to get the soap into the pump. Let it soak for 15-30 minutes and then attach the hoses and try pumping water. If the pump starts pumping water, let it circulate the water for 5-10 minutes before adding paint. The pump does not need to be rinsed of the soap, as it will mix easily with the paint. If the pump still will not prime, call Newstripe for assistance. <b>Disassembly of the pump will void the warranty.</b>
The paint is leaving the nozzle in a stream, and not a spray pattern.	The paint is too thick.	Thin the paint.
The spray stream is inconsistent.	The nozzle screen is obstructed. The suction hose screen is clogged or obstructed.	Remove the nozzle screen and clean or replace it. Remove suction hose and screen. Filter the paint, clean the screen, and remove any clogs.
The spray pattern is too narrow or is uneven.	The spray gun height is incorrect. The nozzle may be the wrong size, or misaligned. The paint viscosity may be too thick.	Adjust the spray head height up or down to achieve the desired line width. See the Spray Gun Assembly. The nozzle slot must be at 90 degrees to the direction of travel. Thin the paint in accordance with the manufacturer recommendations.
Paint drips from the nozzle after it is shut off.	The check ball in the nozzle screen is dirty or worn.	Replace the nozzle screen.

Your machine is designed to be simple and safe to operate.

**Please call Newstripe at 303-364-7786** if you have any questions during setup, painting, or cleaning.



# EcoLiner™ Standard Battery Powered Field Striping Machine

10004483

## 24 Month Warranty

Newstripe, Inc. ("Newstripe") warrants to the original purchaser, for 24 (Twenty Four) Months after date of purchase, that the equipment\* hereby sold shall be free of defects in materials and workmanship. This warranty does not extend to any damage or malfunction resulting in misuse, neglect, accident, improper operation, or normal wear and tear.

\* Gasoline engines, compressors, low pressure pumps, and transaxles are furnished with their respective manufacturers' warranties only and are not covered by any warranty of Newstripe. High pressure pumps manufactured by Newstripe (excluding wear items like diaphragms and valves) are warranted for materials and workmanship for 12 Months after the date of purchase.

Damage incurred in shipment from Newstripe to the purchaser is the total responsibility of the shipping carrier. The purchaser is responsible for noting any damages on the Bill of Lading of the shipping carrier and Newstripe will work with the shipping carrier to resolve any damages incurred.

The Newstripe obligation under this warranty and any implied warranties is limited to replacement or repair of defective parts of its manufacture without charge for 24 (Twenty Four) Months from date of purchase. For service under this warranty, the purchaser shall obtain an approved Return Materials Authorization (RMA) from Newstripe and then ship the defective part or parts of the equipment, transportation prepaid by the purchaser, to Newstripe together with a written description of any claimed defect and proof of purchase date of the materials being returned. To review Newstripe's complete guidelines for warranty claims and returns, please visit our website at [www.newstripe.com](http://www.newstripe.com).

The responsibilities described above are the only responsibilities of Newstripe under this written warranty or any implied warranty and may be exercised only within 24 (Twenty Four) Months from the date of original purchase. In no event shall Newstripe be liable for incidental or consequential damages and no person had any authority to bind it to any representation or warranty. Newstripe is not responsible for work done, materials furnished, or repairs made by others without its specific written authorization.

This warranty shall be in lieu of any and all other warranties, expressed or implied, including any warranties of merchantability or fitness for a particular purpose, and there is no other representation or warranty of any kind with respect to the goods sold hereby except as set forth herein. It is expressly agreed that this warranty shall be limited to the adjustment, repair or replacement of parts and the labor and services required thereby. In no event, including any claim of negligence, shall Newstripe be liable for incidental or consequential damages.



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