



POWERJOE™

CORDLESS PAINT SPRAYER

24-VOLT MAX* | 4.0 Ah

OPERATOR'S MANUAL

A Division of Snow Joe®, LLC

Model 24V-PS1

Form No. SJ-24V-PS1-880E-MR2

IMPORTANT!

Safety Instructions

All Operators Must Read These Instructions Before Use

Always follow these safety guidelines. Failure to do so may result in serious bodily injury or death. Save all warnings and instructions for future reference.

General Safety

⚠️ WARNING! When using the paint sprayer basic safety precautions should always be followed to reduce the risk of fire, electric shock, and personal injury. These include:

Work Area Safety

1. **Keep work area clean and well-lit** – Cluttered, dark areas invite accidents.
2. **Keep children, bystanders, and pets away** – All spectators, including pets, should be kept a safe distance away from the work area.
3. **Do not operate power tools in explosive atmospheres** – Such as in the presence of flammable liquids, gases, or dust. Power tools create sparks which may ignite the dust or fumes.

Personal Safety

1. **Stay alert** – Watch what you are doing. Use common sense. Do not operate the paint sprayer when you are tired, or under the influence of alcohol or drugs.
2. **Dress properly** – Do not wear loose clothing or jewelry. They can get caught in moving parts. Loose clothes, jewelry, or long hair can be caught in moving parts.
3. **Avoid unintentional starting** – Ensure the On/Off switch is in the OFF position before inserting the battery, picking up or carrying the tool. Do not carry the tool with your finger on the trigger.
4. **Do not overreach** – Keep proper footing and balance at all times. Proper footing and balance enable better control of the cordless paint sprayer in unexpected situations.
5. **Use personal protective equipment** – Always wear eye protection. Protective equipment such as dust mask, non-skid safety shoes, hard hat, or hearing protection used for appropriate conditions will reduce personal injuries.

6. **Remove accessories or attachments before turning paint sprayer on.**
7. **If devices are provided for the connection of dust extraction and collection facilities, ensure these are connected and properly used** – Use of dust collection can reduce dust-related hazards.

Tool Use and Care

1. **Do not force the tool** – It will perform better with less likelihood of personal or mechanical injury if it is used at the rate for which it was designed.
2. **Do not use the paint sprayer if switch does not turn on or off** – Any power tool that cannot be controlled with the switch is dangerous and must be repaired.
3. **Disconnect the battery pack from the paint sprayer before making any adjustments, changing accessories, or storing the paint sprayer** – Such preventive safety measures reduce risk of starting the power tool accidentally.
4. **Store idle paint sprayer out of reach of children or other untrained persons** – paint sprayers are dangerous in the hands of untrained users.
5. **Maintain the cordless paint sprayer** – Check for misalignment or binding of moving parts, breakage of parts, and any other condition that may affect the sprayer's operation. If damaged, have the paint sprayer serviced before using. Many accidents are caused by poorly maintained tools.
6. **Use the paint sprayer, accessories etc. in accordance with these instructions, taking into account the working conditions and the work to be performed** – Use of the paint sprayer for operations different from those intended could result in a hazardous situation.

Battery Tool Use and Care

1. **Recharge only with the charger specified by the manufacturer** – A charger that is suitable for one type of battery pack may create a risk of fire when used with another battery pack.
2. **Use this cordless paint sprayer only with Snow Joe® + Sun Joe® iON+ 24V series lithium-iON batteries** – Use of other battery packs may create a risk of injury or fire.

3. **Under abusive conditions, liquid may be ejected from the battery; avoid contact. If contact accidentally occurs, flush with water. If liquid contacts eyes, additionally seek medical help** – Liquid ejected from the battery may cause irritation or burns.

Service

1. **If your power tool requires service, contact an authorized Snow Joe® + Sun Joe® dealer or call the Snow Joe® + Sun Joe® customer service center at 1-866-SNOWJOE (1-866-766-9563).** Only identical replacement parts should be utilized for repairs. This will ensure that the safety of the power tool is maintained.
2. **If the battery charger cable is damaged, it must be immediately replaced to avoid a hazard.** Contact the Snow Joe® + Sun Joe® customer service center at 1-866-SNOWJOE (1-866-766-9563) for assistance.
3. **Accessories:** The use of accessories or attachment other than those recommended in this manual might present a hazard.
4. When servicing, only use the identical replacement parts.

Safety Rules for Cordless Paint Sprayer

⚠ CAUTION! DANGER OF INJURY! Never point the spray gun to yourself or other person or pets.

1. Only coating material such as paint, enamels, varnishes, etc, with a flash point of 73.5°F (23°C) and above can be sprayed without any additional warning.
2. This device may not be suitable for working in locations which are covered by the explosion protection regulations.
3. When spraying, make sure there's no source of ignition, like open fire, cigarettes, cigars, pipes, sparking, glowing wires, hot surfaces, etc. in the area.
4. Wear breathing protection when spraying.
5. Inside and outside care must be taken to make sure that no solvent vapors can be sucked into the device.
6. When working outdoors, consider the effect of wind, which will affect the direction of the spray.
7. When working indoors, make sure there will be sufficient ventilation.
8. Do not spray at the device.
9. Do not let children play with this device. Keep it out of reach of children.
10. Do not use the device to spray flammable liquids.
11. Do not clean the device with flammable solvents.
12. Take precautionary measures against potential hazards from the liquid that need to be sprayed. Follow the instructions given by the liquid manufacturer.
13. Do not spray any liquid with unknown potential hazard.
14. Forbidden to spray to the hatch of the motor etc.

Battery + Charger Safety Instructions

We pay a great deal of attention to the design of every battery pack to ensure that we supply you with batteries that are safe, durable and have a high energy density. The battery cells have a wide range of safety devices. Each individual cell is initially formatted and its electrical characteristic curves are recorded. This data is then used exclusively to be able to assemble the best possible battery packs.

Despite all the safety precautions, caution must always be exercised when handling batteries. The following points must be obeyed at all times to ensure safe use. Safe use can only be guaranteed if undamaged cells are used. Incorrect handling of the battery pack can cause cell damage.

IMPORTANT! Analyses confirm that incorrect use and poor care of high-performance batteries are the main factors responsible for personal and/or product damage.

⚠ WARNING! Use only approved replacement batteries; other batteries may damage the cordless paint sprayer and cause it to malfunction, which can lead to personal injury.

⚠ WARNING! Do not use a battery pack or appliance that is damaged or modified. Damaged or modified batteries may exhibit unpredictable behavior resulting in fire, explosion or risk of injury.

Do not modify or attempt to repair the appliance or the battery pack except as indicated in the instructions for use and care.

Have your battery pack serviced by a qualified repair person using only identical replacement parts. This will ensure that the safety of the battery pack is maintained.

⚠ CAUTION! To reduce the risk of injury, charge the iON+ 24V lithium-ion battery pack only in its designated iON+ 24V lithium-ion charger. Other types of chargers present risk of fire, personal injury and damage. Do not wire a battery pack to a power supply plug or car cigarette lighter. Such misuse will permanently disable or damage the battery pack.

- **Avoid dangerous environments** – Do not charge the battery pack in rain, snow or in damp or wet locations. Do not use the battery pack or charger in the presence of explosive atmospheres (gaseous fumes, dust or flammable materials) because sparks may be generated when inserting or removing the battery pack, which could lead to a fire.
- **Charge in a well-ventilated area** – Do not block the charger vents. Keep them clear to allow for proper ventilation. Do not allow smoking or open flames near a charging battery pack. Vented gases may explode.
NOTE: The safe temperature range for the battery is 41°F – 105°F (5°C – 40.5°C). Do not charge the battery outside in freezing weather; charge it at room temperature.
- **Maintain charger cord** – When unplugging the charger, pull the plug, not the cord, from the receptacle to reduce the risk of damage to the electrical plug and cord. Never carry

the charger by its cord or yank it by the cord to disconnect it from the receptacle. Keep the cord away from heat, oil and sharp edges. Make sure the cord will not be stepped on, tripped over or subjected to damage or stress when the charger is in use. Do not use the charger with a damaged cord or plug. Replace a damaged charger immediately.

- **Do not use an extension cord unless it is absolutely necessary** – Using the wrong, damaged or improperly wired extension cord poses a risk of fire and electric shock. If an extension cord must be used, plug the charger into a properly wired 16 gauge or larger extension cord with the female plug matching the male plug on the charger. Make sure that the extension cord is in good electrical condition.
- **Charger 24VCHRG-AC is rated for 100 – 240 volt AC only** – The charger must be plugged into an appropriate receptacle.
- **Use only recommended attachments** – Use of an attachment not recommended or sold by the battery charger or battery pack manufacturer may result in risk of fire, electric shock or personal injury.
- **Unplug charger when not in use** – Make sure to remove battery packs from unplugged chargers.

⚠ WARNING! To reduce the risk of electric shock, always unplug the charger before performing any cleaning or maintenance. Do not allow water to flow into the charger. Use a Ground Fault Circuit Interrupter (GFCI) to reduce shock hazards.

- **Do not burn or incinerate battery packs** – Battery packs may explode, causing personal injury or damage. Toxic fumes and materials are created when battery packs are burned.
- **Do not crush, drop or damage battery packs** – Do not use the battery pack or charger if they have sustained a sharp blow, been dropped, run over or have been damaged in any way (i.e. pierced with a nail, hit with a hammer, stepped on, etc.).
- **Do not disassemble** – Incorrect reassembly may pose a serious risk of electric shock, fire or exposure to toxic battery chemicals. If the battery or charger are damaged, contact an authorized Snow Joe® + Sun Joe® dealer or call the Snow Joe® + Sun Joe® customer service center at 1-866-SNOWJOE (1-866-766-9563) for assistance.
- **Battery chemicals cause serious burns** – Never let a damaged battery pack contact the skin, eyes or mouth. If a damaged battery pack leaks battery chemicals, use rubber or neoprene gloves to safely dispose of it. If skin is exposed to battery fluids, wash the affected area with soap and water and rinse with vinegar. If eyes are exposed to battery chemicals, immediately flush with water for 20 minutes and seek medical attention. Remove and dispose of contaminated clothing.
- **Do not short circuit** – A battery pack will short circuit if a metal object makes a connection between the positive and negative contacts on the battery pack. Do not place a battery pack near anything that may cause a short circuit, such as paper clips, coins, keys, screws, nails and other

metallic objects. A short-circuited battery pack poses a risk of fire and severe personal injury.

- **Store your battery pack and charger in a cool, dry place** – Do not store the battery pack or charger where temperatures may exceed 105°F (40.5°C), such as in direct sunlight or inside a vehicle or metal building during the summer.

Information about the battery

1. The battery pack supplied with your cordless paint sprayer is only partially charged. The battery pack has to be charged completely before you use the tool for the first time.
2. For optimum battery performance, avoid low discharge cycles by charging the battery pack frequently.
3. Store the battery pack in a cool place, ideally at 77°F (25°C) and charged to at least 40%.
4. Lithium-ion batteries are subject to a natural aging process. The battery pack must be replaced at the latest when its capacity falls to just 80% of its capacity when new. Weakened cells in an aged battery pack are no longer capable of meeting the high power requirements needed for the proper operation of your paint sprayer, and therefore pose a safety risk.
5. Do not throw battery packs into an open fire as this poses a risk of explosion.
6. Do not ignite the battery pack or expose it to fire.
7. Do not exhaustively discharge batteries. Exhaustive discharge will damage the battery cells. The most common cause of exhaustive discharge is lengthy storage or non-use of partially discharged batteries. Stop working as soon as the performance of the battery falls noticeably or the electronic protection system triggers. Place the battery pack in storage only after it has been fully charged.
8. Protect batteries and the tool from overloads. Overloads will quickly result in overheating and cell damage inside the battery housing even if this overheating is not apparent externally.
9. Avoid damage and shocks. Immediately replace batteries that have been dropped from a height of more than one meter or those that have been exposed to violent shocks, even if the housing of the battery pack appears to be undamaged. The battery cells inside the battery may have suffered serious damage. In such instances, please read the waste disposal information for proper battery disposal.
10. If the battery pack suffers overloading and overheating, the integrated protective cutoff will switch off the equipment for safety reasons.
IMPORTANT! Do not press the ON/OFF switch any more if the protective cut-off has been activated. This may damage the battery pack.
11. Use only original battery packs. The use of other batteries poses a fire risk and may result in injuries or an explosion.

Information about the charger and the charging process

1. Please check the data marked on the rating plate of the battery charger. Be sure to connect the battery charger to a power supply with the voltage marked on the rating plate. Never connect it to a different mains voltage.
2. Protect the battery charger and its cord from damage. Keep the charger and its cord away from heat, oil and sharp edges. Have damaged cords repaired without delay by a qualified technician at an authorized Snow Joe® + Sun Joe® dealer or call the Snow Joe® + Sun Joe® customer service center at 1-866-SNOWJOE (1-866-766-9563).
3. Electrical plugs must match the outlet. Never modify the plug in any way. Do not use any adapter plugs with grounded appliances. Unmodified plugs and matching outlets will reduce the risk of electric shock.
4. Keep the battery charger, battery pack and the cordless tool out of the reach of children.
5. Do not use the supplied battery charger to charge other cordless tools.
6. During periods of heavy use, the battery pack will become warm. Allow the battery pack to cool to room temperature before connecting it to the charger to recharge.
7. Do not overcharge batteries. Do not exceed the maximum charging times. These charging times only apply to discharged batteries. Frequent insertion of a charged or partially charged battery pack will result in overcharging and cell damage. Do not leave batteries connected to the charger for days on end.
8. Never use or charge batteries if you suspect that it has been more than 12 months since the last time they were charged. There is a high probability that the battery pack has already suffered dangerous damage (exhaustive discharge).
9. Charging batteries at a temperature below 41°F (5°C) will cause chemical damage to the cells and may cause a fire.
10. Do not use batteries that have been exposed to heat during the charging process, as the battery cells may have suffered dangerous damage.
11. Do not use batteries that have suffered curvature or deformation during the charging process or those that exhibit other atypical symptoms (gassing, hissing, cracking, etc.).
12. Never fully discharge the battery pack (maximum recommended depth of discharge is 80%). A complete discharge of the battery pack will lead to premature aging of the battery cells.

Protection from environmental influences

1. Wear suitable work clothes. Wear safety goggles.
2. Protect your cordless tool and the battery charger from moisture and rain. Moisture and rain can cause dangerous cell damage.
3. Do not use the cordless tool or the battery charger near vapors and flammable liquids.
4. Use the battery charger and cordless tools only in dry conditions and at an ambient temperature of 41°F – 105°F (5°C – 40.5°C).
5. Do not keep the battery charger in places where the temperature is liable to reach over 105°F (40.5°C). In particular, do not leave the battery charger in a car that is parked in the sunshine.
6. Protect batteries from overheating. Overloads, overcharging and exposure to direct sunlight will result in overheating and cell damage. Never charge or work with batteries that have been overheated – replace them immediately, if possible.
7. Store the charger and your cordless tool only in dry locations with an ambient temperature of 41°F – 105°F (5°C – 40.5°C). Store your lithium-ion battery pack in a cool, dry place at a temperature of 77°F (25°C). Protect the battery pack, charger and cordless tool from humidity and direct sunlight. Only place fully charged batteries in storage (charged to at least 40%).
8. Prevent the lithium-ion battery pack from freezing. Battery packs that were stored below 32°F (0°C) for more than 60 minutes must be discarded.
9. When handling batteries, be wary of electrostatic charge. Electrostatic discharges can damage the electronic protection system and the battery cells. Avoid electrostatic charging and never touch the battery poles.

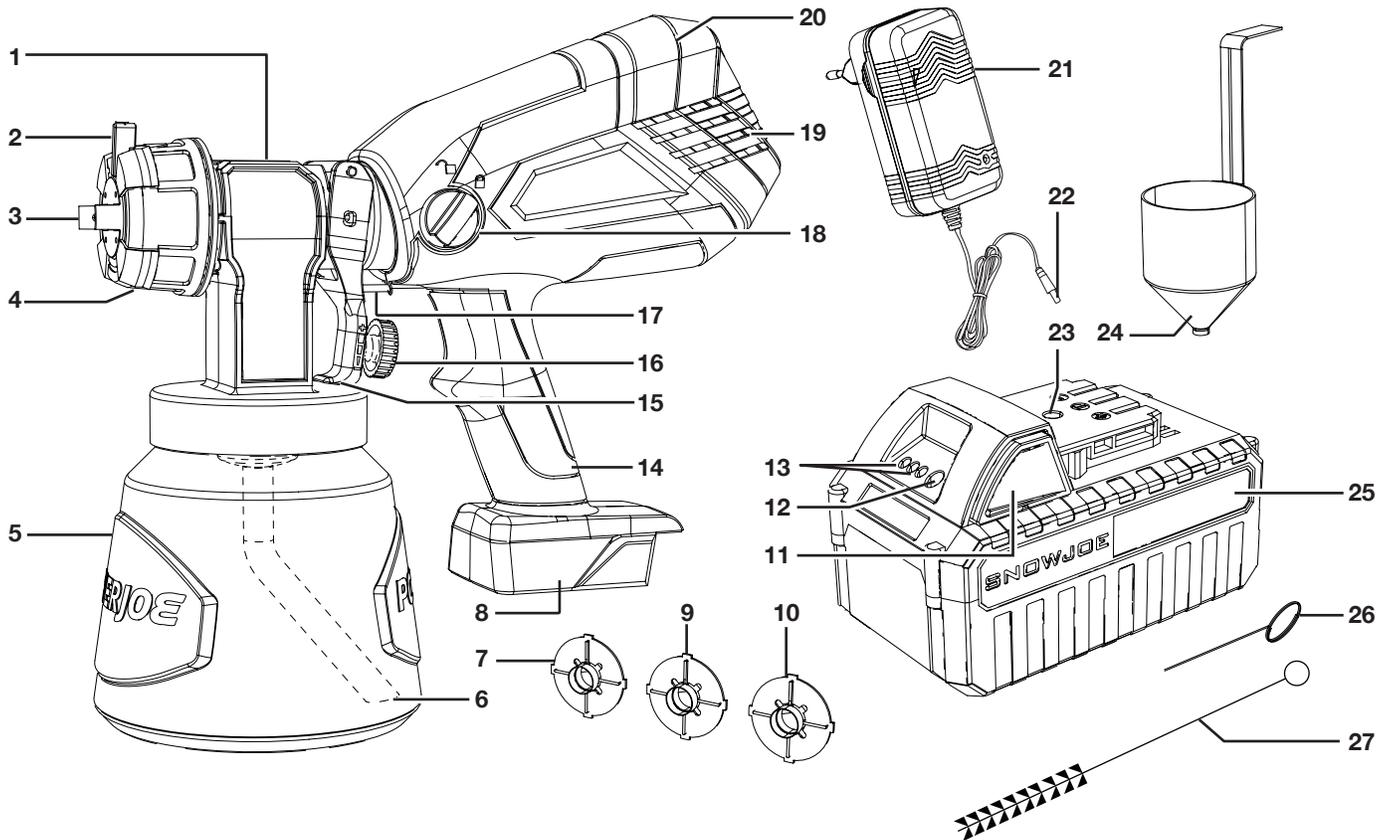
Safety Symbols

The following table depicts and describes safety symbols that may appear on this product. Read, understand, and follow all instructions on the machine before attempting to assemble and operate.

Symbols	Descriptions	Symbols	Descriptions
	READ THE OPERATOR'S MANUAL(S) – Read, understand, and follow all instructions in the user manual(s) before attempting to assemble and operate.		SAFETY ALERT – Indicates a precaution, a warning, or a danger.
	WARNING! Do not expose the unit to rain or wet conditions. Keep dry.		WEAR EYE PROTECTION – For protection against injury, wear safety goggles.
	Respirators, protective clothing, and gloves will reduce the possibility of personal injuries.		WARNING! Risk of Explosion-Do not spray flammable liquids.
	Keep bystanders and children a safe distance away.		Indoor use only. Only use battery charger indoors.
	DISPOSAL – Waste produced by electrical machine items should not be handled like normal household rubbish. Please recycle where recycle facilities exist. Check with your local authority or retailer for recycling advice.		

Know Your Cordless Paint Sprayer

Read the owner's manual and safety instructions carefully before operating the cordless paint sprayer. Compare the illustration below to the cordless paint sprayer in order to familiarize yourself with the location of the various controls and adjustments. Save this manual for future reference.



- | | | |
|------------------------------|---------------------------------------|--|
| 1. Spray gun assembly | 11. Push lock button | 20. Turbine |
| 2. Spray width control lever | 12. Push button for battery indicator | 21. iON+ 24V lithium-ion charger (24VCHRG-AC) |
| 3. Air cap | 13. Battery indicators | 22. Charger plug |
| 4. Tip collar | 14. Handle | 23. Charge socket |
| 5. Paint container | 15. On/Off switch | 24. Viscosity cup |
| 6. Suction tube (inside) | 16. Flow control knob | 25. iON+ 24V lithium-ion battery (24VBAT) featuring exclusive EcoSharp® technology |
| 7. 1.5 mm nozzle tip (White) | 17. Switch trigger lever | 26. Needle clean-out tool |
| 8. Battery compartment | 18. Quick release knob | 27. Cleaning brush |
| 9. 1.8 mm nozzle tip (Black) | 19. Air Vent | |
| 10. 2.2 mm nozzle tip (Red) | | |

Technical Data

Battery Voltage*	24V D.C.
Battery Capacity	4.0 Ah
Battery Run Time Max	20 mins
Charger Input	100 – 240V AC, 50 – 60 Hz, 50 W
Charger Output	25.2V DC \equiv 1400 mA
Charging Time Max	2 hrs 40 min
Motor	210 W
Max Flow	3.2 Gallon/charge (12 l/charge)
Nozzle Size	1.5 mm/1.8 mm/2.2 mm
Max Viscosity	85 – 100 DIN-s
Paint Container Capacity	32 fl oz (1.0 l)
Weight (Paint sprayer alone)	2.64 lbs (1.2 kg)
Weight (With battery installed)	4.4 lbs (2 kg)

*Initial no-load voltage, when fully charged, peaks at 24 volts; nominal voltage under typical load is 21.6 volts.

Unpacking

Carton Contents

- Sprayer turbine assembly
- Spray gun assembly
- 2 nozzle tips (the third one is pre-assembled inside the paint sprayer)
- Viscosity cup
- iON+ 24V lithium-ion battery
- iON+ 24V lithium-ion battery charger
- Needle clean-out tool
- Cleaning brush
- Manuals with registration card

1. Carefully remove the cordless paint sprayer and check to see that all of the above items are supplied.
2. Inspect the product carefully to make sure no breakage or damage occurred during shipping. If you find damaged or missing parts, DO NOT return the unit to the store. Please call the Snow Joe® + Sun Joe® customer service center at 1-866-SNOWJOE (1-866-766-9563).

NOTE: Do not discard the shipping carton and packaging material until you are ready to use your new cordless paint sprayer. The packaging is made of recyclable materials. Properly dispose of these materials in accordance with local regulations.

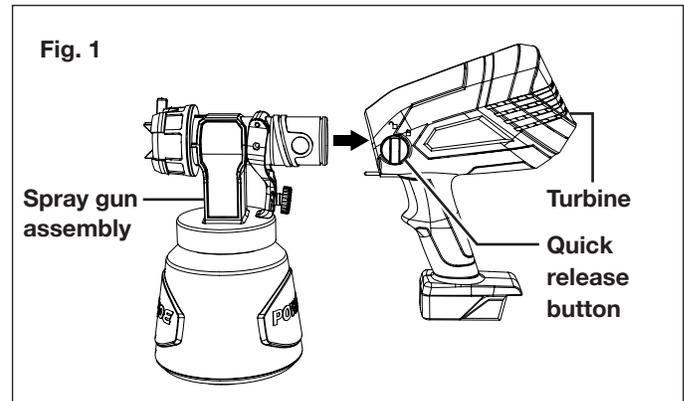
IMPORTANT! The equipment and packaging material are not toys. Do not let children play with plastic bags, foils, or small parts. These items can be swallowed and pose a suffocation risk!

Assembly

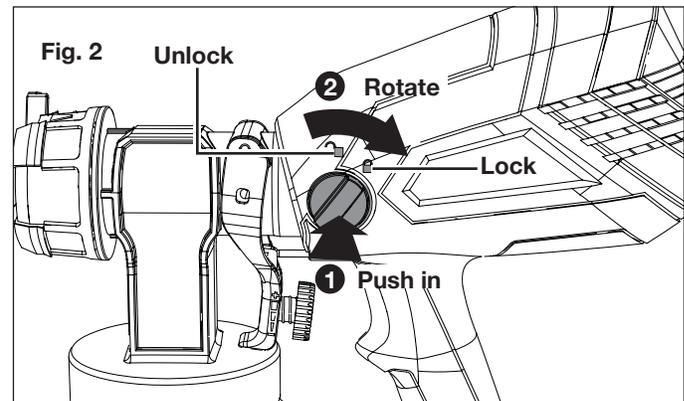
⚠ WARNING! Do not insert the battery until assembly is complete. Failure to comply could result in accidental starting and possible property damage.

⚠ WARNING! Assemble this unit in well ventilated area. Make sure there's no flammable vapors around.

1. Make sure the quick release knob is in the unlock position, and insert the spray gun assembly fully inside the opening on the end of the sprayer turbine assembly (Fig. 1).



2. Push and rotate the quick release knob to lock in position to fix the assembly (Fig. 2).



Battery Pack Operation

The equipment is powered by a lithium-ion battery. The battery pack is completely sealed and maintenance free.

⚠ WARNING! Before first use, the battery requires at least 2 hrs 40 min charge time to be fully charged. When the battery is at low capacity, recharge for 2 hrs 40 min again before resuming operation.

Battery Charge Level Indicator

The battery pack is equipped with a push button for checking the charge level. Simply press the push button to read off the battery charge level from the LEDs of the battery indicator:

- All 3 level monitoring LEDs are lit: Battery charge level is high.
- 2 level monitoring LEDs are lit: Battery charge level is decreasing. Stop work as soon as possible.
- 1 level monitoring LED is lit: Battery is flat. Stop work IMMEDIATELY and charge the battery. Otherwise the battery's service life will be greatly shortened.

Lights	Light Indicators
	
	Charge level button
	The battery is at 30% capacity and requires charging
	The battery is at 60% capacity and requires charging soon
	The battery is at full capacity

NOTE: If the charge level button does not appear to be working, connect the battery to the charger and charge as needed.

NOTE: Immediately after using the battery pack, the charge level button may display a lower charge than it will if checked a few minutes later. The battery cells "recover" some of their charge after resting.

Charger Operation

⚠ WARNING! Charge only iON+ 24V lithium-ion battery packs with its compatible iON+ 24V lithium-ion charger. Other types of batteries may cause personal injury and damage. Other types of batteries may cause personal injury and damage.

To reduce the risk of electric shock, do not allow water to flow into the charger's AC/DC plug.

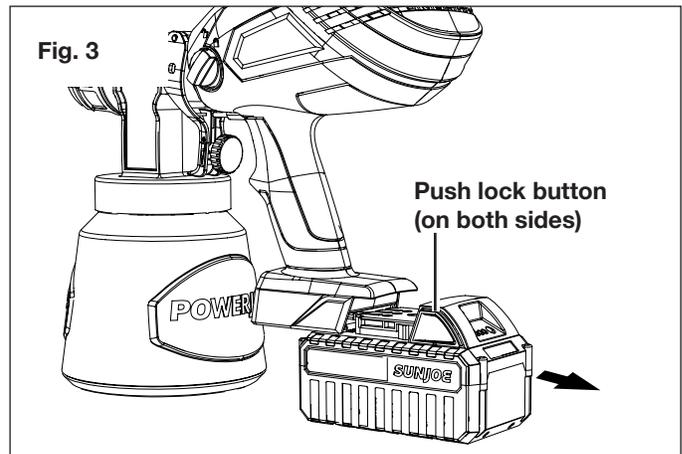
When to Charge the iON+ 24VBAT Lithium-Ion Battery

NOTE: The iON+ 24VBAT lithium-ion battery packs do not develop a "memory" when charged after only a partial discharge. Therefore, it is not necessary to run down the battery pack before placing it into the charger.

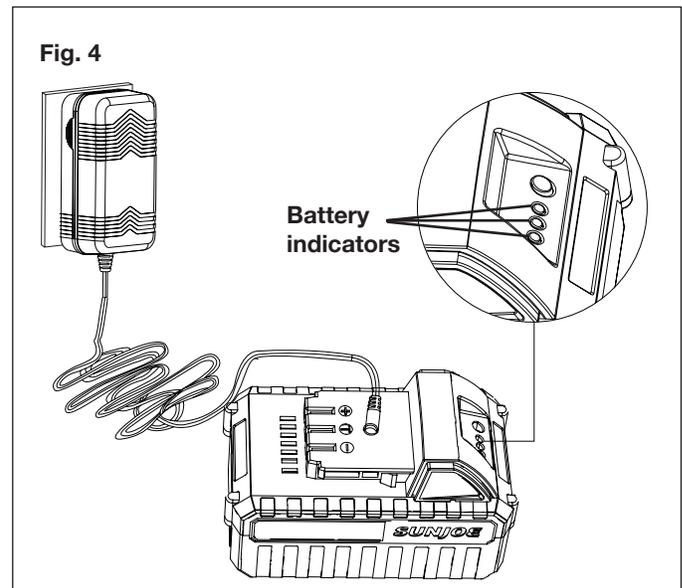
- Use the battery charge indicator lights to determine when to charge your iON+ 24VBAT lithium-ion battery pack.
- You can "top-off" your battery pack's charge before starting a big job or after a long day of use.

Charging the Battery

1. Press the push lock buttons on the battery to pull the battery pack out of the equipment (Fig. 3).



2. Check that the mains voltage is the same as that marked on the rating plate of the battery charger. Then, plug the charger adapter into an appropriate AC power outlet. Connect the charger plug into the charge socket of the battery to start charging (Fig. 4).



3. The battery will take approximately 2 hrs 40 min to charge. The battery indicator LEDs will twinkle and illuminate one by one during the charging process. Unplug the charger immediately when the 3 LEDs are all illuminated.

⚠ CAUTION! FIRE HAZARD. When disconnecting the charger from the battery, be sure to unplug the charger from the outlet first, then disconnect the charger from the battery.

⚠ WARNING! This charger does not automatically turn off when the battery is fully charged. Please take care not to leave the battery plugged into the charger. Switch off or unplug the charger at the mains when charging is complete.

- Timely recharging of the battery will help prolong the battery's life. You must recharge the battery pack when you notice a drop in the equipment's power.

IMPORTANT! Never allow the battery pack to become fully discharged as this will cause irreversible damage to the battery.

Preparation

Material Preparation

The material being used may need to be thinned (diluted) with the proper solvent as specified by the material manufacturer. Never exceed the thinning advice given by the coating manufacturer.

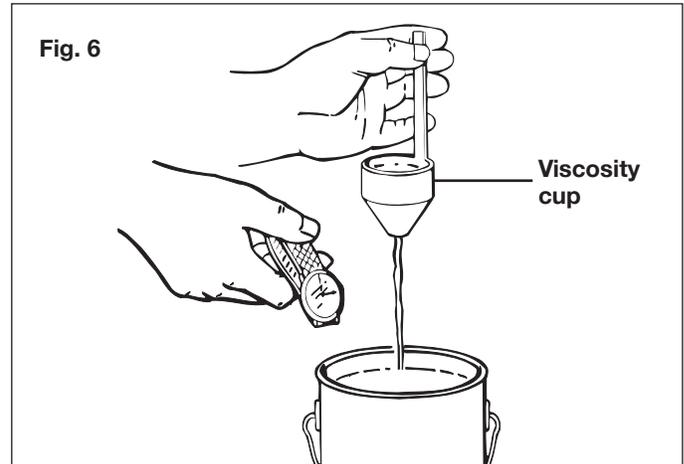
⚠️ WARNING! Do not spray material that has a flashpoint lower than 73.5°F (23°C).

After thinning the material, use the viscosity cup included to test the viscosity of the material. Follow the instruction below for proper testing the viscosity.

- Stir the spraying material thoroughly before measuring viscosity (Fig. 5).



- Dip the viscosity cup completely into the spraying material and make sure the cup is filled with the material. Hold the cup with material over the container, measure the amount of time in seconds it takes for the stream of the material flowing out to "break" or stop being a constant stream out of the bottom of the cup. This is the **Runout Time** (Fig. 6).



- For proper runout time of specific material, refer the thinning table below.

THINNING TABLE	
Material	Reference Runout Time
Oil enamel	25-40 seconds
Oil based primer	30-45 seconds
Latex	No thinning required
Oil stain	No thinning required
Clear sealer	No thinning required
Polyurethane	No thinning required
Varnish	20-50 seconds

⚠️ WARNING! Do not spray material that has a runout time greater than 70 seconds.

NOTE: Before filling the spray material into the paint container, make sure to strain the material to remove any impurities in the paint, which may enter and clog the system. Impurities in the paint will give poor performance and a poor finish.

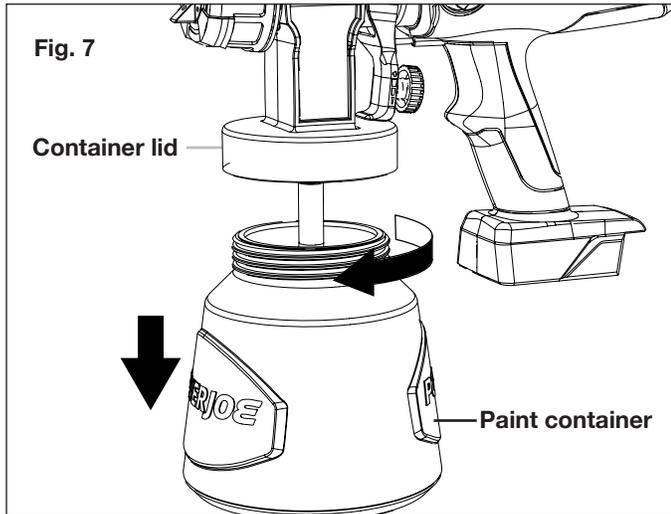
Working Environment Preparation

- Make sure the surface is properly prepared for the best finish. The surface should be free from dust, dirt, rust or grease. Lightly pressure wash decks or exterior surfaces and wait until they are dry to start spraying.
- This cordless paint sprayer is equipped with HVLP technology, which will help to avoid most overspray issues. However, it's still recommended to mask all edges and other areas during spraying. Use drop cloths to protect the floor and anything else in the spraying area that needs to remain untouched.
- Before starting, have gloves, paper towels, rags, etc. available for unexpected spills.

Operation

Filling the paint container

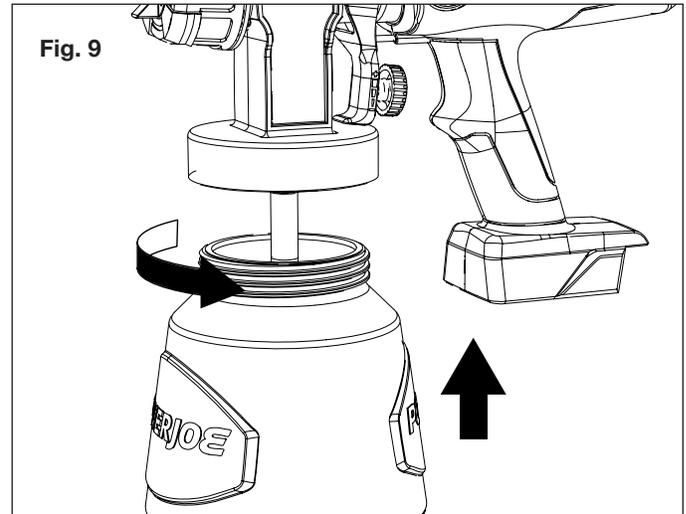
1. Before filling the container, check that the spray gun assembly is securely attached to the turbine assembly.
2. Unscrew the paint container and remove it from the container lid (Fig. 7).



3. Place the container on a smooth and horizontal surface firmly. Pour the properly thinned and strained material into the container (Fig. 8).

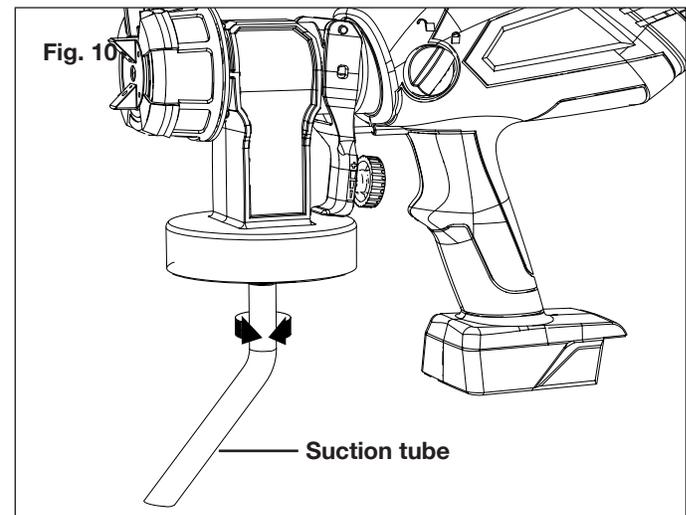


4. Clean any residual liquid from the threads or body of the container.
5. Align both the paint gun and container, and attach the lid securely to the top of the container. Tighten securely. Check the lid to make sure it's threaded on squarely and securely before picking up the sprayer (Fig. 9).

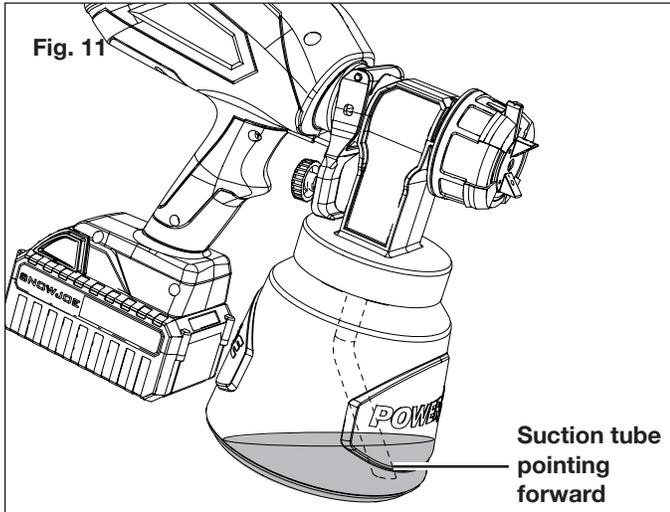


Align the Suction Tube

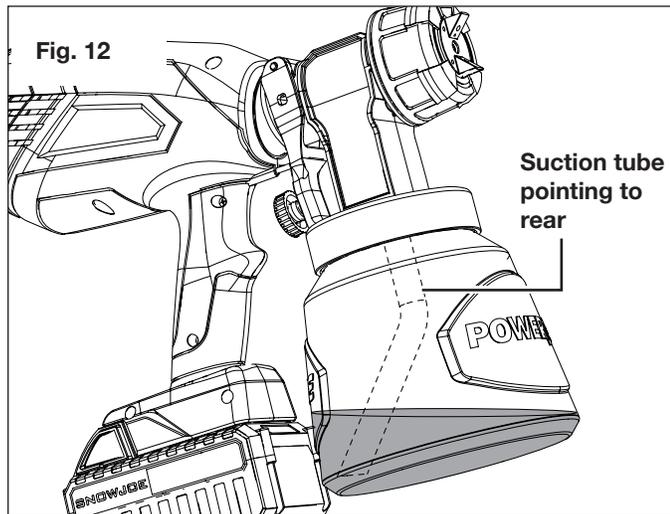
Before reattaching the paint container, adjust the direction of the suction tube based on the direction of the painting project (Fig. 10). A properly directed suction tube will use the paint material more efficiently and reduce the need to refill during the project.



1. To spray in a downward direction, the angled end of the suction tube should be pointing toward the front of the gun (Fig. 11).



2. To spray in an upward direction, the angled end of the suction tube should be pointing toward the rear of the gun (Fig. 12).



⚠ WARNING! Never tilt the sprayer at an angle greater than 45°. Material could get into the turbine and damage the sprayer.

Change the Nozzle Tip

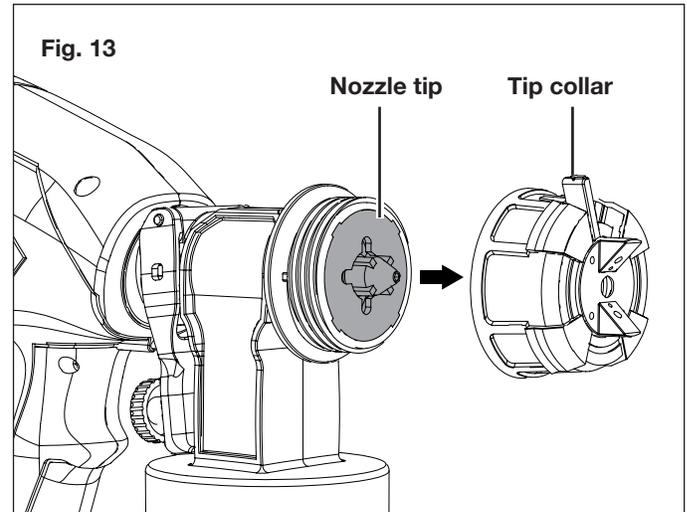
The machine comes with 3 nozzle tips:

- **White** – 1.5 mm orifice. Pre-assembled in the gun
- **Black** – 1.8 mm orifice. Packed separately
- **Red** – 2.2 mm orifice. Packed separately

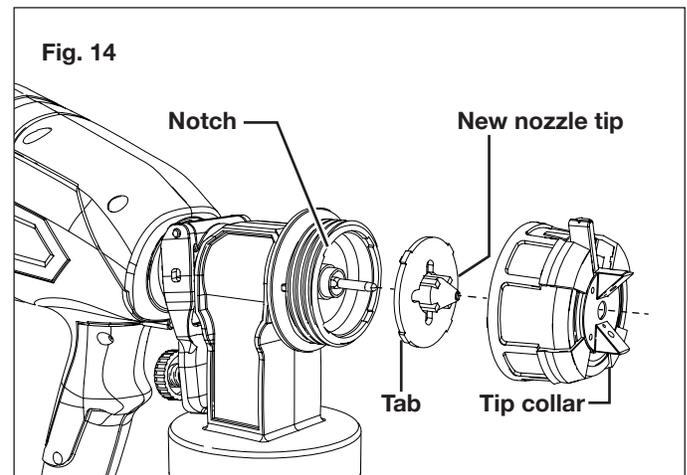
When selecting the appropriate nozzle tip for a specific job, consider the spray material you will be using. Generally, heavier coatings will require a larger orifice size than lighter ones. For example, primers are usually thicker than the accompanying paint so you should use the black 1.8 mm tip to prime most surfaces. Most painters will stay in the range of 1.2 mm to 2.0 mm unless the paint being applied is specialized.

To change the nozzle tip, follow the instructions below:

1. Make sure the tool is switched off and the battery is removed from the compartment.
2. Unscrew and remove the tip collar slowly, be careful that the small parts may fall out, and remove the nozzle tip inside (Fig. 13).



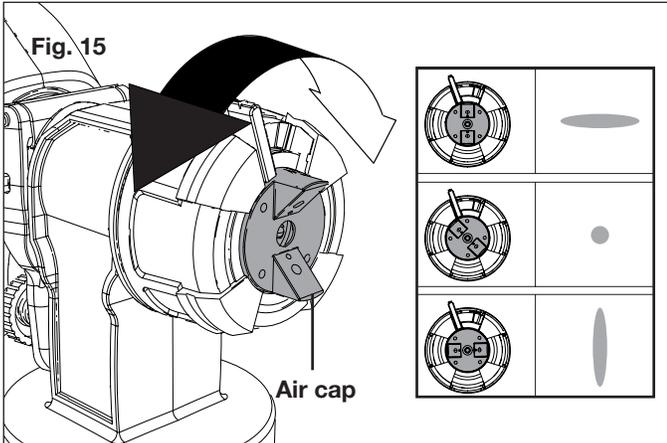
3. Assemble the desired nozzle tip by aligning the 4 tabs on the tip with the notches on the sprayer and inserting the middle needle in the middle hole of the nozzle tip. Press firmly until the nozzle tip sit securely in position. Replace the tip collar and tighten securely (Fig. 14).



Adjusting the Spray Patterns

The spray pattern shape can be adjusted by turning the ears of the air cap to either the vertical, horizontal, or diagonal positions. The positions of the air cap and the corresponding spray pattern shapes are illustrated below (Fig. 15).

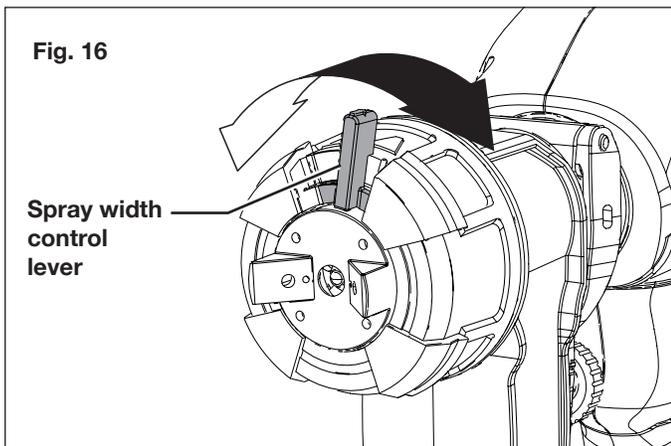
Test each pattern and use whichever pattern is suitable for your application.



⚠ WARNING! Switch off the unit and remove the battery before adjusting the spray pattern. NEVER point the spray gun at any part of the body.

Adjusting the Spray Width

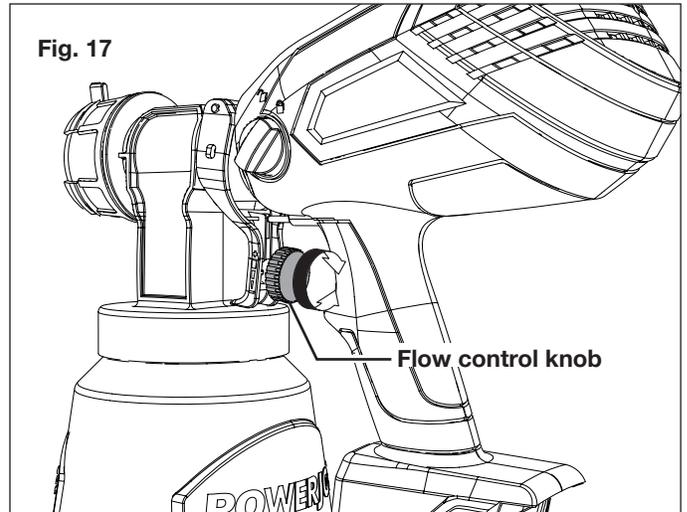
The sprayer width can be adjusted by the spray width control lever. Turn the lever counterclockwise for a narrow spray, clockwise for a wider spray (Fig. 16).



⚠ WARNING! Switch off the unit and remove the battery before adjusting the spray width. NEVER point the spray gun at any part of the body.

Adjusting the Spray Amount

The flow control knob regulates the amount of liquid that can be sprayed. Turning the knob clockwise increases the flow of liquid; turning the knob counterclockwise decreases the flow of the liquid (Fig. 17).



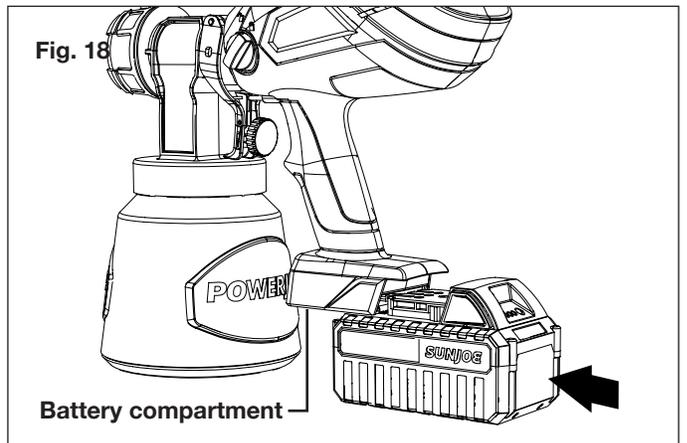
NOTE: Always test the spray on scrap cardboard and similar material first. Begin with largest flow setting. If less flow is desired, adjust the flow control knob slowly until the appropriate flow amount is achieved.

Basic Spray Process

⚠ WARNING! DO NOT insert the battery until all settings are done and you are ready to use the paint sprayer. Do not squeeze the On/Off switch until you are ready to spray.

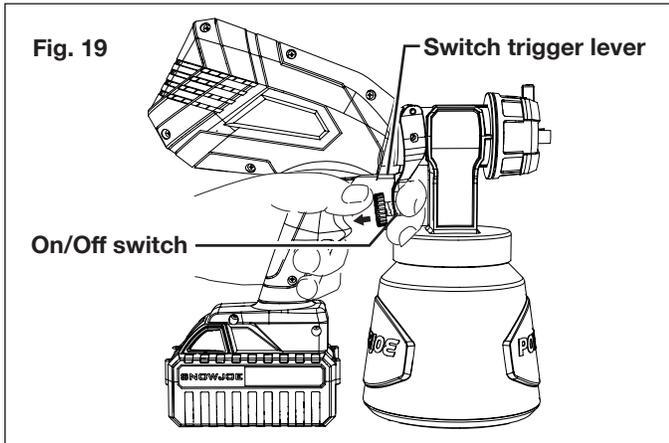
⚠ WARNING! Always do a test spray on scrap material before a new project, after changing material and spray settings.

1. Insert the battery into the battery compartment on the back of the machine, until it clicks into position (Fig. 18).



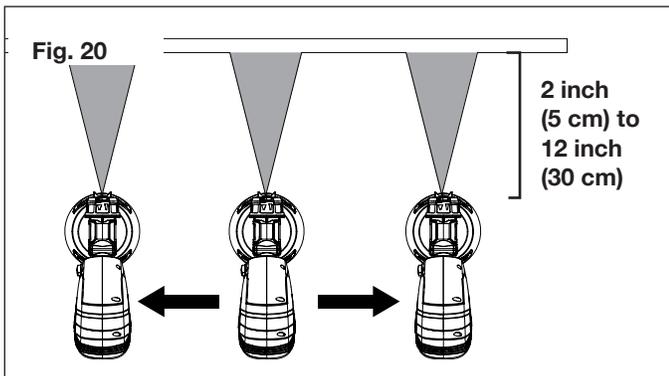
2. Position the paint sprayer perpendicular to the spray surface, keep the distance between the sprayer and the surface between 2 inch (5 cm) and 12 inch (30 cm), depending on the spray pattern and size desired.

- Squeeze the On/Off switch, which will actuate the trigger switch lever to press the trigger inside the tool (Fig. 19).



- Spray perpendicular to the surface with smooth passes at a consistent speed as illustrated below. This will help to avoid irregularities in the finish (Fig. 20).

NOTE: When spraying, always switch on the sprayer after moving and release the On/Off switch before stopping moving. Always keep the sprayer pointed perpendicular to the spray surface and overlap passes slightly to obtain the most consistent and professional finish possible.

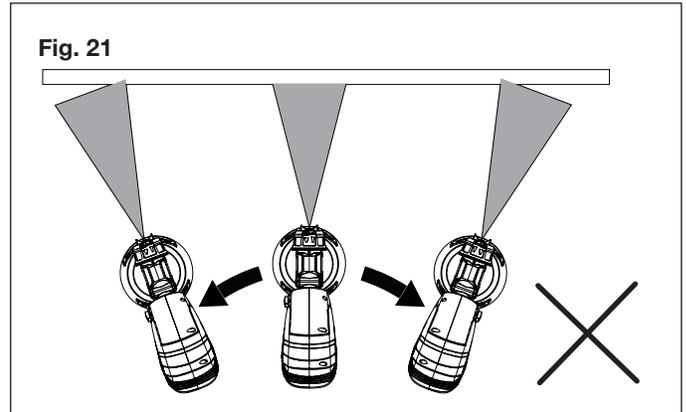


- Release the On/Off switch to stop the unit. Remove the battery before storage or any adjustment.

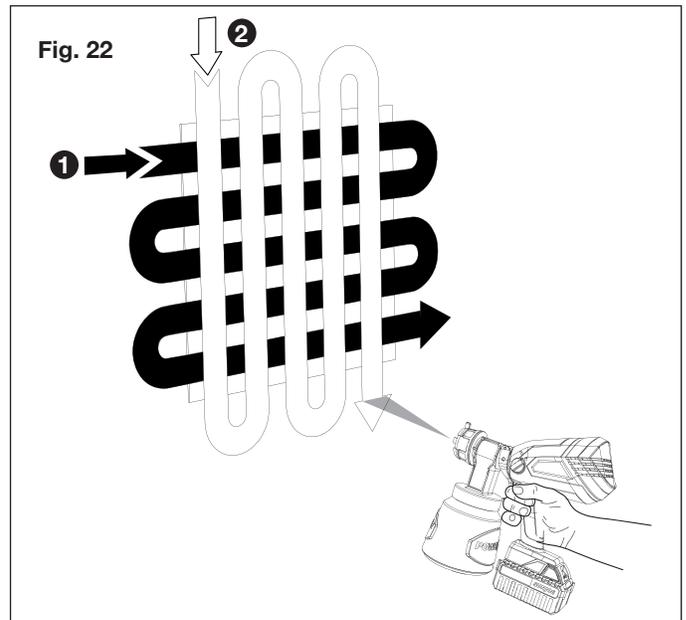
Spray Tips

- Practice spraying on a scrap material like cardboard to test the spray pattern and get familiar with the flow control feature of the sprayer.
- Ensure the surface to be sprayed is free of dust, dirt, and grease.
- Ensure spray area is clean and free of dust that could be blown onto the newly sprayed surface.
- Cover area that not intended to be sprayed.
- Keep the nozzle at a minimum of 2 inch (5 cm) and a maximum of 12 inch (30 cm) away from the surface (Fig. 20).

- To get an even spray distribution, keep your arm at the same distance and avoid moving the wrist during spraying (Fig. 21).



- When spraying a large surface, it's recommended to spray in a "crisscross" path: first spray in horizontal stripes and then cross over these stripes in vertical stripes (Fig. 22).



- Maintain a smooth moving action during spray. Avoid stay too long at one spot. Several times of light coating is better than one time of thick coating, which can lead to spray material running and dripping. Have a dry paint brush on hand to smooth out any running and dripping of the spray material if needed.

Cleaning + Maintenance

⚠️ WARNING! To avoid accidents, always remove the battery and disconnect the charger from the power supply. Never immerse the unit in any liquid for cleaning.

The paint sprayer can only be operated normally if it's cleaned and preserved after each use. When cleaning, use the appropriate cleaning solution (warm, soapy water for latex materials; mineral spirits for oil-based materials). If flammable solvents need to be used, always use such kind of solvents in a well-ventilated area free of flammable vapors.

⚠️ WARNING! NEVER use any solvent that have a flashpoint lower than 73.5°F (23°C).

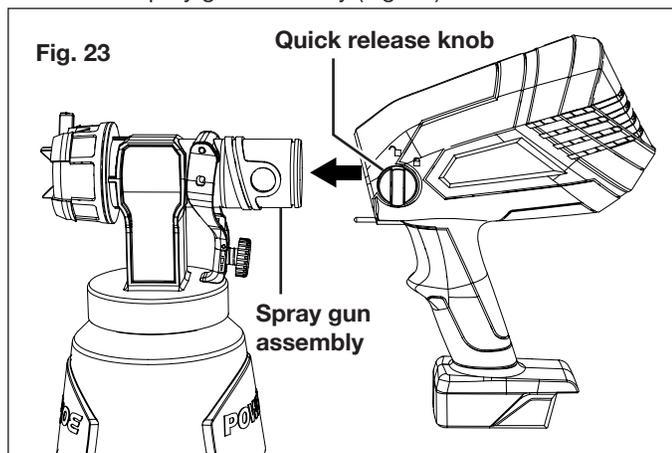
Clean the Paint Container

1. Stop the sprayer and remove the battery. Press the On/Off switch so that the material inside the spray gun assembly flows back into the container.
2. Unscrew the container. Discard any unused paint or stain to its original container.

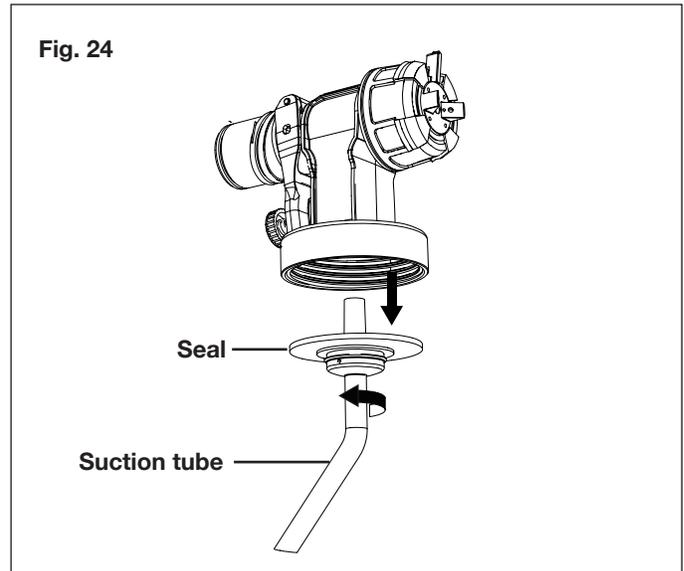
NOTE: Do not return any paint to the original container if it has been thinned. Discard appropriately according to regulations or save in a separate container.
3. Pour a small amount of the appropriate cleaning solution into the container. Clean the container and properly dispose of the cleaning solution. Refill the container with new cleaning solution.
4. Reattached the container on the sprayer. Insert the battery and spray the solution through the gun in a safe area. Refill and repeat spray process, until the solvent being sprayed is clean and clear.
5. Stop the sprayer and remove the battery. Press the On/Off switch so that the material inside the spray gun assembly flows back into the container.

Clean the Housing and the Parts

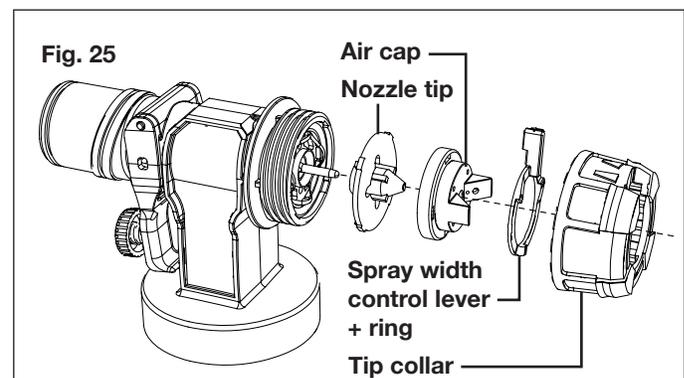
1. Remove the paint container and pour out any remaining solvents.
2. Turn the quick release knob to the unlock position and pull out the spray gun assembly (Fig. 23).



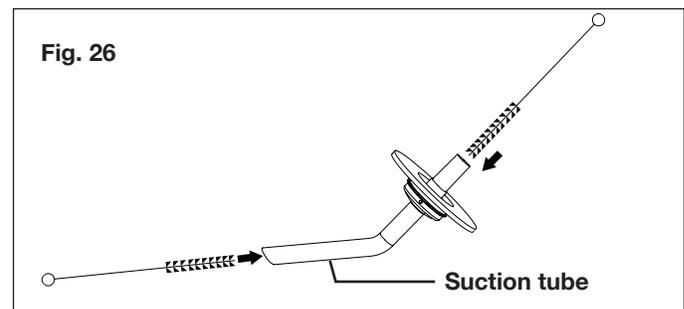
3. Turn the suction tube clockwise and pull out to remove the seal and the suction tube (Fig. 24).



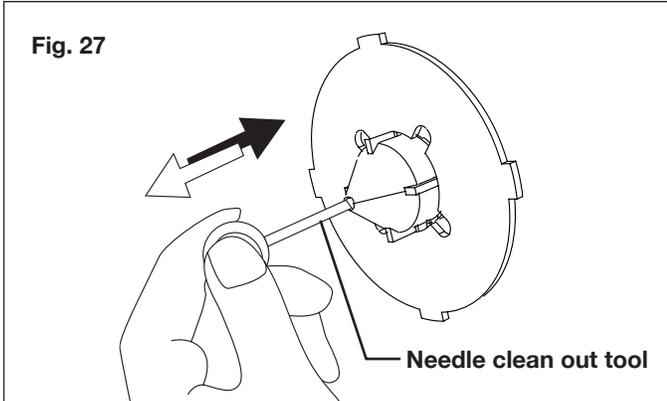
4. Unscrew the tip collar, remove the spray width control lever + ring, air cap and the nozzle tip (Fig. 25).



5. Dip a clean cloth in water or proper solvent, and clean all the disassembled parts, the gun assembly, and the motor housing.
6. Double check the suction tube. If it's blocked, use the supplied cleaning brush to clean through the inlet and the outlet (Fig. 26).



7. If needed, use the needle clean out tool to clean the nozzle tip (Fig. 27).

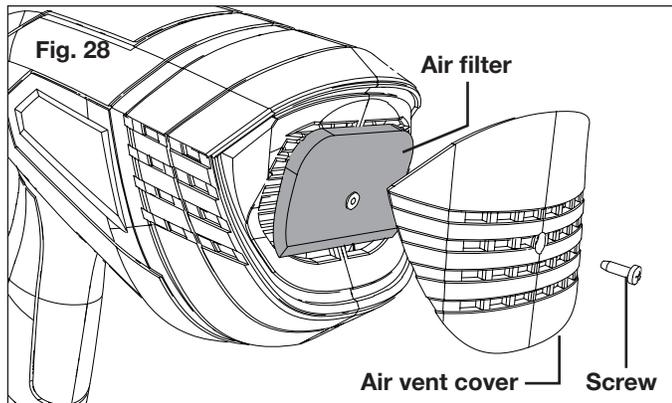


8. Before storage, make sure to dry out all the parts.

Clean the Air Filter

Periodically inspect the air filter in the turbine to see if it is excessively dirty. Follow the instructions below to clean if it is dirty.

1. Make sure the sprayer is turned off and the battery is removed.
2. Use a screw driver to remove the small screw on the back of the turbine, then remove the air vent cover to expose the air filter (Fig. 28).



3. Clean the air filter with clean water, dry out thoroughly, and reposition it on the air vents. Replace the air vent cover and fix with the screw.

⚠ WARNING! Never operate your unit without the air filter. Dirt could be sucked in and interfere with the function of the unit.

Storage

1. Examine the cordless paint sprayer thoroughly for worn, loose or damaged parts. Should you need to repair or replace a part, contact an authorized Snow Joe® + Sun Joe® dealer or call the Snow Joe® + Sun Joe® customer service center at 1-866-SNOWJOE (1-866-766-9563) for assistance.
2. Remove the battery from the cordless paint sprayer before storing.

3. Store the cordless paint sprayer indoors in a locked, dry place out of the reach of children to prevent unauthorized use or damage.

Battery + Charger Off-Season Storage

1. Do not expose your battery pack or charger to water, rain or allow them to get wet. This could permanently damage the charger and the battery pack. Do not use oil or solvents to clean or lubricate your battery pack as the plastic casing can become brittle and crack, causing a serious risk of injury.
2. Store the battery pack and charger at room temperature away from moisture. Do not store in damp locations where corrosion of terminals may occur. As with other battery pack types, permanent capacity loss can result if the pack is stored for long periods of time at high temperatures (over 120°F/49°C).
3. iON+ 24VBAT lithium-ion battery packs maintain their charge during storage longer than other battery pack types. As a general practice, it is best to unplug the battery charger and remove the battery pack when they are not in use. Recharge the battery pack every 6 months to 50% capacity (2 lights on) during off-season storage to maintain optimal battery performance.

Battery Caution + Disposal

Always dispose of your battery pack according to federal, state, and local regulations. Contact a recycling agency in your area for recycling locations.

⚠ CAUTION! Even discharged battery packs contain some energy. Before disposing, use electrical tape to cover the terminals to prevent the battery pack from shorting, which could cause a fire or explosion.

⚠ WARNING! To reduce the risk of injury or explosion, never burn or incinerate a battery pack even if it is damaged, dead or completely discharged. When burned, toxic fumes and materials are emitted into the surrounding atmosphere.

1. Batteries vary according to device. Consult your manual for specific information.
2. Install only new batteries of the same type in your product (where applicable).
3. Failure to insert batteries in the correct polarity, as indicated in the battery compartment or manual, may shorten the life of the batteries or cause batteries to leak.
4. Do not mix old and new batteries.
5. Do not mix Alkaline, Standard (Carbon-Zinc) or Rechargeable (Nickel Cadmium, Nickel Metal Hydride, or Lithium-Ion) batteries.
6. Do not dispose of batteries in fire.
7. Batteries should be recycled or disposed of as per state and local guidelines.

Service and Support

If your Sun Joe® 24V-PS1 cordless paint sprayer requires service or maintenance, please call the Snow Joe® + Sun Joe® customer service center at 1-866-SNOWJOE (1-866-766-9563).

Model and Serial Numbers

When contacting the company, reordering parts or arranging service from an authorized dealer, you will need to provide the model and serial numbers, which can be found on the decal located on the housing of the unit. Copy these numbers into the space provided below.

<p>Record the following numbers from the housing or handle of your new product:</p> <p>Model #:</p> <p>2 4 V - P S 1</p> <p>Serial #:</p>

24VCHRG-AC

Federal Communications Commission (FCC)

⚠ WARNING! Any changes or modifications to this unit not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

Class B device:

NOTE: This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules.

These limits are designed to provide reasonable protection against harmful interference in a residential installation.

This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications.

However, there is no guarantee that interference will not occur in a particular installation.

If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

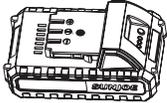
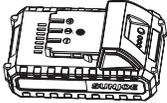
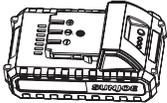
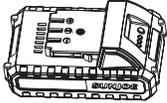
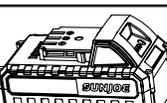
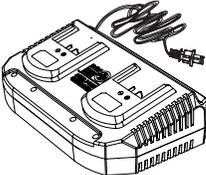
Troubleshooting

Most difficulties are easy to fix. Consult the troubleshooting table for common problems and their solutions. If you continue to experience problems or need repairs beyond these minor adjustments, please call 1-866-SNOWJOE (1-866-766-9563) for assistance.

Problem	Possible Cause	Solution
Little or no material flow	<ul style="list-style-type: none"> a) Nozzle clogged. b) Suction tube clogged. c) Material volume setting turned too low. d) Suction tube loose. e) No pressure build up in container. f) Air filter clogged. 	<ul style="list-style-type: none"> a) Clean the nozzle with the supplied needle clean-out tool. b) Clean the suction tube with the supplied cleaning brush. c) Increase the spray amount by adjusting the flow control knob. d) Tighten the suction tube. e) Tighten the paint container. f) Clean the air filter.
Material leaking	<ul style="list-style-type: none"> a) Nozzle is loose. b) Nozzle is worn. c) Suction tube loose. d) Material builds up and blocks the air cap and nozzle. 	<ul style="list-style-type: none"> a) Insert the nozzle tip securely. b) Replace the nozzle. c) Tighten the suction tube. d) Clean the blocked air cap and the nozzle.
The spray is not fine	<ul style="list-style-type: none"> a) Viscosity of material is too high. b) Spray tip orifice is too large. c) Material volume setting too high. d) Nozzle clogged. e) Air filter clogged. f) Too little pressure build-up in container. 	<ul style="list-style-type: none"> a) Thin the material properly. b) Change to a smaller nozzle tip. c) Decrease the spray amount by adjusting the flow control knob. d) Clean the nozzle with the supplied needle clean-out tool. e) Clean the air filter. f) Tighten the paint container.
Cannot generate continuous spray	<ul style="list-style-type: none"> a) Material in the spray container is running out. b) Air filter is clogged. 	<ul style="list-style-type: none"> a) Refill the container. b) Clean the air filter.
Paint runs or drips on the surface	<ul style="list-style-type: none"> a) There's too much paint applied on the surface. 	<ul style="list-style-type: none"> a) Decrease the spray amount by adjusting the flow control knob. b) Move fast with the sprayer.
Too much overspray	<ul style="list-style-type: none"> a) The sprayer is too far from the surface. b) There's too much paint applied on the surface. 	<ul style="list-style-type: none"> a) Reduce the distance. b) Decrease the spray amount by adjusting the flow control knob or move quickly with the sprayer.
Paint is light and not even on the surface	<ul style="list-style-type: none"> a) The sprayer is moved too fast during spraying. 	<ul style="list-style-type: none"> a) Increase the spray amount by adjusting the flow control knob or move slower with the sprayer.

Optional Accessories

⚠️ WARNING! ALWAYS use only authorized Snow Joe® + Sun Joe® replacement parts and accessories. NEVER use replacement parts or accessories that are not intended for use with this cordless paint sprayer. Contact Snow Joe® + Sun Joe® if you are unsure whether it is safe to use a particular replacement part or accessory with your cordless paint sprayer. The use of any other attachment or accessory can be dangerous and could cause injury or mechanical damage.

Accessories	Item	Model
	iON+ 24V 1.3 Ah Lithium-Ion Battery <i>Charge times vary by charger. See website for details.</i> <i>Battery Runtime Max: 6.5 min.</i>	24VBAT-LTW
	iON+ 24V 1.5 Ah Lithium-Ion Battery <i>Charge times vary by charger. See website for details.</i> <i>Battery Runtime Max: 7.5 min.</i>	24VBAT-LTX
	iON+ 24V 2.0 Ah Lithium-Ion Battery <i>Charge times vary by charger. See website for details.</i> <i>Battery Runtime Max: 10 min.</i>	24VBAT-LTE
	iON+ 24V 2.5 Ah Lithium-Ion Battery <i>Charge times vary by charger. See website for details.</i> <i>Battery Runtime Max: 12.5 min.</i>	24VBAT-LT
	iON+ 24V 4.0 Ah Lithium-Ion Battery <i>Charge times vary by charger. See website for details.</i> <i>Battery Runtime Max: 20 min.</i>	24VBAT
	iON+ 24V 5.0 Ah Lithium-Ion Battery <i>Battery Runtime Max: 25 min.</i>	24VBAT-XR
	iON+ 24V Lithium-Ion Battery Quick Charger	24VCHRG-QC
	iON+ 24V Lithium-Ion Battery Charger	24VCHRG-DPC

NOTE: Accessories are subject to change without any obligation on the part of Snow Joe® + Sun Joe® to provide notice of such changes. Accessories can be ordered online at sunjoe.com or via phone by contacting the Snow Joe® + Sun Joe® customer service center at 1-866-SNOWJOE (1-866-766-9563).



SNOW JOE® + SUN JOE® CUSTOMER PROMISE

ABOVE ALL ELSE, Snow Joe, LLC (“Snow Joe”) is dedicated to you, our customer. We strive to make your experience as pleasant as possible. Unfortunately, there are times when a Snow Joe®, Sun Joe®, or Aqua Joe® product (“Product”) does not work or breaks under normal operating conditions. We think it’s important that you know what you can expect from us. That’s why we have a Limited Warranty (“Warranty”) for our Products.

OUR WARRANTY:

Snow Joe warrants new, genuine, powered and non-powered Products to be free from defects in material or workmanship when used for ordinary household use for a period of two years from the date of purchase by the original, end-user purchaser when purchased from Snow Joe or from one of Snow Joe’s authorized sellers with proof of purchase. Because Snow Joe is unable to control the quality of its Products sold by unauthorized sellers, unless otherwise prohibited by law, this Warranty does not cover Products purchased from unauthorized sellers. If your Product does not work or there’s an issue with a specific part that is covered by the terms of this Warranty, Snow Joe will elect to either (1) send you a free replacement part, (2) replace the Product with a new or comparable product at no charge, or (3) repair the Product. How cool is that!

This Warranty gives you specific legal rights, and you may also have other rights which vary from State to State.

PRODUCT REGISTRATION:

Snow Joe strongly encourages you to register your Product. You can register online at snowjoe.com/register, or by printing and mailing in a registration card available online from our website, or calling our Customer Service Department at **1-866-SNOWJOE (1-866-766-9563)**, or by e-mailing us at help@snowjoe.com. Failure to register your Product will not diminish your warranty rights. However, registering your Product will allow Snow Joe to better serve you with any of your customer service needs.

WHO CAN SEEK LIMITED WARRANTY COVERAGE:

This Warranty is extended by Snow Joe to the original purchaser and original owner of the Product.

WHAT IS NOT COVERED?

This Warranty does not apply if the Product has been used commercially or for non-household or rental applications. This Warranty also does not apply if the Product was purchased from an unauthorized seller. This Warranty also does not cover cosmetic changes that do not affect performance. Wearing parts like belts, augers, chains and tines are not covered under this Warranty, and can be purchased at snowjoe.com or by calling **1-866-SNOWJOE (1-866-766-9563)**.



sunjoe.com