

TrueCoat™ and TrueCoat™ Plus Paint Sprayers

U.S. Patent No. D625,775 S; 6,619,569; D633,176 S; and other patents pending;
Community Design Registration #001225833; Community Design Registration #001228255;
India Patent No. 230061; China Patent No. ZL201030238948.3
Taiwan Patent No. D140774

3A0159E

EN

**- For portable spray applications of water-based and oil-based (mineral spirit-type)
architectural paints and coatings only-**

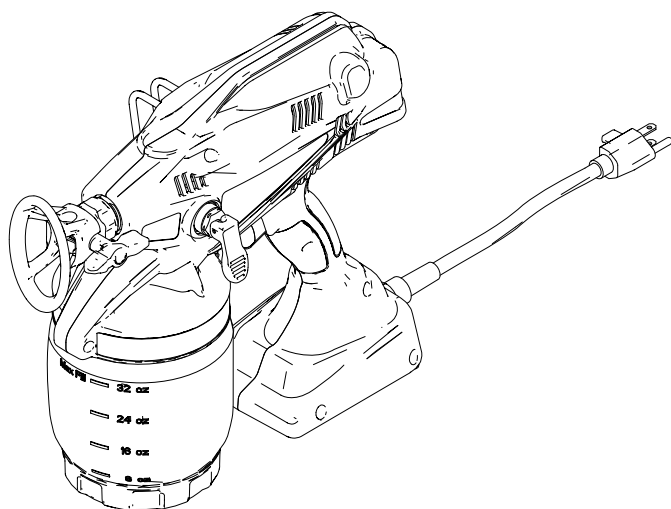


IMPORTANT SAFETY INSTRUCTIONS

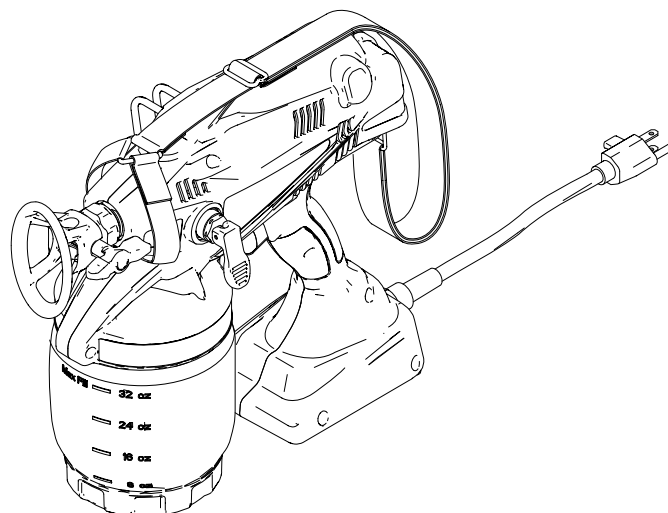
Read all warnings and instructions in this
manual. Save these instructions.

Models 258870, 258875, 258866, and 258863

Maximum Working Pressure 2000 psi (137 bar, 13.7 MPa)



**TrueCoat Model: 258870
258866**



**TrueCoat Plus Model: 258875
258863**

WARNING



Use only water-based or oil-based (mineral spirit-type) materials with flash point greater than 100° F (38° C). Do not use materials which state "FLAMMABLE" on the packaging. For more information about your material, request MSDS from distributor or retailer.

Use oil-based material outdoors or in a well-ventilated indoor area with a flow of fresh air.



Intertek
110474

PROVEN QUALITY. LEADING TECHNOLOGY.

Certified to CAN/CSA C22.2 No. 68
Conforms to
UL 1450

Table of Contents

Warnings	3	Install Tip/Guard Assembly	
TrueCoat™ Component Identification	6	(if not installed)	13
TrueCoat™ Plus Component Identification	7	Shoulder Strap Installation	13
Using Electrical Cords	8	Basic Spraying Techniques	14
Grounding and Electrical Requirements	8	Triggering Sprayer	14
Power Cord	8	Aiming Sprayer	14
Extension Cord Requirements	8	Unclogging Spray Tip/Guard Assembly	15
Common Procedures	9	Shutdown and Cleaning	16
Pressure Relief Procedure	9	Flushing Sprayer	16
Trigger Lock	9	Cleaning Sprayer Exterior	18
Spray Tip Position	9	Tips	18
Control Lever Position	9	Storage	18
Setup	10	Replacement Parts and Kits	19
Overheating Protection	10	Troubleshooting	20
Installing Suction Tube	10	Alternate Priming Method	23
Spraying Stains or Clear Coats		Inlet Valve Cleaning	24
(Fine-Finish Optimizer)	10	Technical Data	25
Sprayer Setup	11	Graco Standard Warranty	28

Important User Information

Read this before using your sprayer. See the Operation Manual provided with your sprayer for complete instructions on proper use and safety warnings.

DO NOT RETURN THIS SPRAYER TO THE STORE!
If you experience problems call Graco Customer Service at 1-888-541-9788.

Congratulations! You have purchased a high-quality paint sprayer made by Graco Inc. This sprayer is designed to provide superior spray performance with water-based and oil-based (mineral spirit-type) architectural paints and coatings. This user information sheet is intended to help you understand the types of materials that can and cannot be used with your sprayer.

Before using this equipment, be sure to read and follow the information on your container label and ask for a Material Safety Data Sheet (MSDS). The container label and MSDS will explain the contents of the material and the specific precautions related to it.

Paints, coatings and clean-up materials generally fit into one of the following **3 basic categories**:



WATER-BASED: The container label should indicate that the material can be cleaned up with soap and water. Your sprayer is compatible with this type of material. Your sprayer is **NOT** compatible with harsh cleaners such as chlorine bleach.



OIL-BASED: The container label should indicate that the material is combustible and can be cleaned up with mineral spirits or paint thinner. The MSDS must indicate that the flash point of the material is above 100° F. Your sprayer is compatible with this type of material. Use oil-based material outdoors or in a well-ventilated indoor area with a flow of fresh air. See the safety warnings in your Operation Manual.



FLAMMABLE: This type of material contains flammable solvents such as xylene, toluene, naphtha, MEK, lacquer thinner, acetone, denatured alcohol, and turpentine. The container label should indicate that this material is **FLAMMABLE**. This type of material is **NOT** compatible with your sprayer and **CANNOT** be used.

Warnings

The following warnings are for the setup, use, maintenance, and repair of this equipment. The exclamation point symbol alerts you to a general warning and the hazard symbols refer to procedure-specific risks. When these symbols appear in the body of this manual, refer back to these Warnings. Product-specific hazard symbols and warnings not covered in this section may appear throughout the body of this manual where applicable.

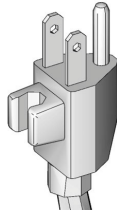
! WARNING



GROUNDING

This product must be grounded. In the event of an electrical short circuit, grounding reduces the risk of electric shock by providing an escape wire for the electric current. This product is equipped with a cord having a grounding wire with an appropriate grounding plug. The plug must be plugged into an outlet that is properly installed and grounded in accordance with all local codes and ordinances.

- Improper installation of the grounding plug is able to result in a risk of electric shock.
- When repair or replacement of the cord or plug is required, do not connect the grounding wire to either flat blade terminal.
- The wire with insulation having an outer surface that is green with or without yellow stripes is the grounding wire.
- Check with a qualified electrician or serviceman when the grounding instructions are not completely understood, or when in doubt as to whether the product is properly grounded.
- Do not modify the plug provided; if it does not fit the outlet, have the proper outlet installed by a qualified electrician.
- This product is for use on a nominal 120V circuit and has a grounding plug similar to the plug illustrated in the figure below.



- Only connect the product to an outlet having the same configuration as the plug.
- Do not use an adapter with this product.

Extension Cords:

- Use only a 3-wire extension cord that has a 3-blade grounding plug and a 3-slot receptacle that accepts the plug on the product.
- Make sure your extension cord is not damaged. When using an extension cord, be sure to use a cord heavy enough to carry the current that your sprayer draws. See chart for appropriate sizes and lengths:

Extension Cord Gauge (AWG Minimum)	Extension Cord Length (Maximum)
18	50 ft (15 m)
16	100 ft (30 m)
14	200 ft (60m)

- An undersized extension cord will result in a drop in line voltage and loss of power, overheating, and possible damage to equipment.

! WARNING



FIRE AND EXPLOSION HAZARD

Flammable fumes, such as solvent and paint fumes, in work area can ignite or explode. To help prevent fire and explosion:

- Sprayer generates sparks. Do not spray or flush with flammable liquids.
- Use only water-based or oil-based (mineral spirit-type) materials with a flash point greater than 100° F (38° C).
- Keep spray area well-ventilated. Keep a good supply of fresh air moving through the area.
- Use oil-based material outdoors or in a well-ventilated indoor area with a flow of fresh air.
- Paint or solvent flowing through the equipment is able to result in static electricity. Static electricity creates a risk of fire or explosion in the presence of paint or solvent fumes. All parts of the spray system and objects in and around the spray area shall be properly grounded to protect against static discharge and sparks.
- Verify that all containers and collection systems are grounded to prevent static discharge.
- Connect to a grounded outlet and use grounded extensions cords. Do not use a 3-to-2 adapter.
- Do not spray or flush with combustible materials near an open flame or sources of ignition.
- Do not smoke in the spray area.
- Do not operate light switches, engines, or similar spark producing products in the spray area.
- Keep area clean and free of paint or solvent containers, rags, and other flammable materials.
- Know the contents of the paints and solvents being sprayed. Read all Material Safety Data Sheets (MSDS) and container labels provided with the paints and solvents. Follow the paint and solvents manufacturer's safety instructions.
- Fire extinguisher equipment shall be present and working.



ELECTRIC SHOCK HAZARD

This equipment must be grounded. Improper grounding, setup, or usage of the system can cause electric shock.

- Turn off and disconnect power cord before servicing equipment.
- Use only grounded electrical outlets.
- Use only 3-wire extension cords.
- Ensure ground prongs are intact on power and extension cords.
- Do not expose to rain. Store indoors.








SKIN INJECTION HAZARD

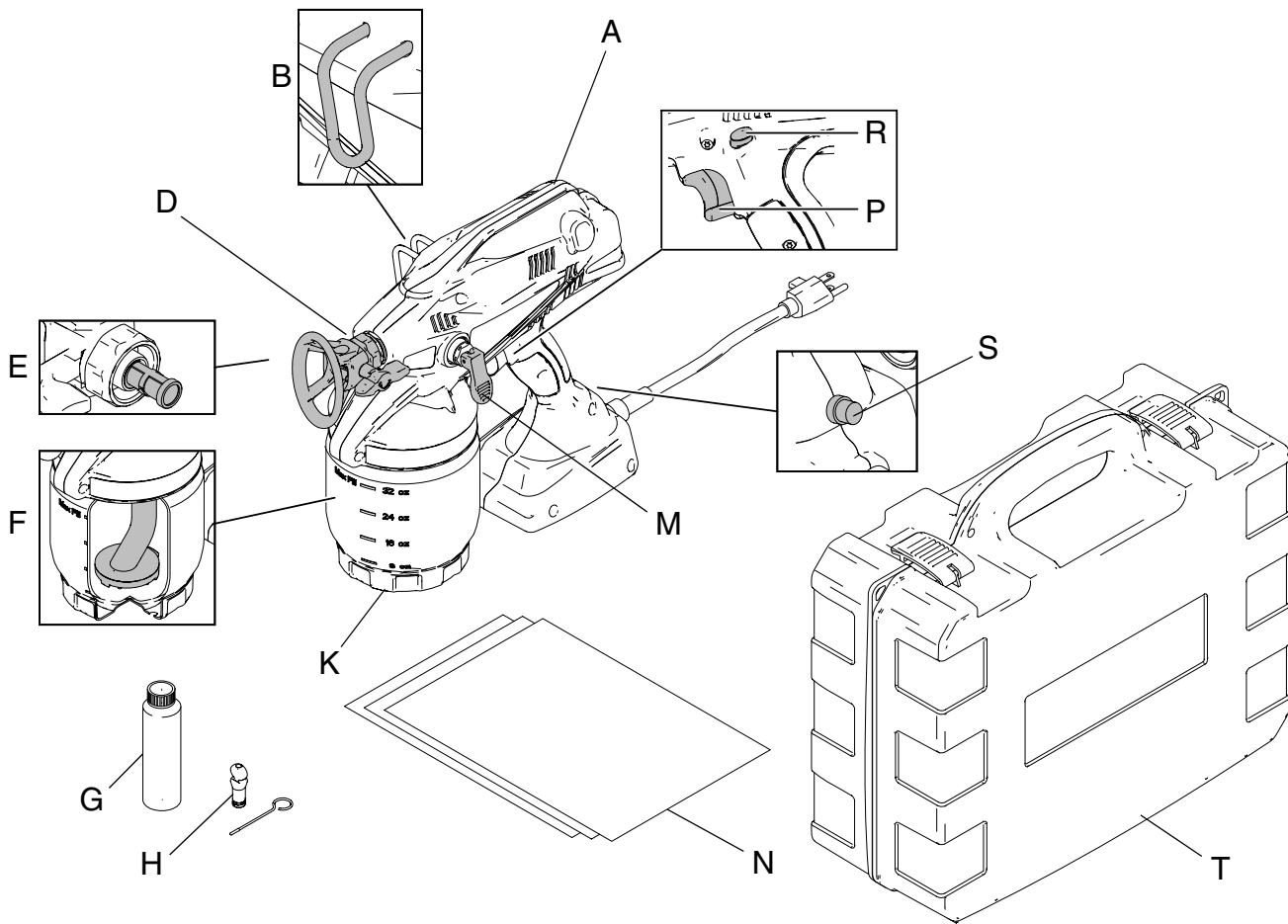
High-pressure spray is able to inject toxins into the body and cause serious bodily injury. In the event that injection occurs, **get immediate surgical treatment**.

- Do not aim the sprayer at, or spray any person or animal.
- Keep hands and other body parts away from the discharge. For example, do not try to stop leaks with any part of the body.
- Always engage the trigger lock when not spraying. Verify the trigger lock is functioning properly.
- Always use the nozzle tip guard. Do not spray without nozzle tip guard in place.
- Use caution when cleaning and changing nozzle tips. In the case where the nozzle tip clogs while spraying, follow the **Pressure Relief Procedure** for turning off the unit and relieving the pressure before removing the nozzle tip to clean.
- Do not leave the unit energized or under pressure while unattended. When the unit is not in use, turn off the unit and follow the **Pressure Relief Procedure** for turning off the unit.
- Check parts for signs of damage. Replace any damaged parts.
- This system is capable of producing 2000 psi. Use replacement parts or accessories that are rated a minimum of 2000 psi.
- Do not carry the tool with a finger on the trigger.
- Verify that all connections are secure before operating the unit.
- Know how to stop the unit and bleed pressure quickly. Be thoroughly familiar with the controls.

! WARNING

	<p>EQUIPMENT MISUSE HAZARD</p> <p>Misuse can cause death or serious injury.</p> <ul style="list-style-type: none"> • Always wear appropriate gloves, eye protection, and a respirator or mask when painting. • Do not operate or spray near children. Keep children away from equipment at all times. • Do not overreach or stand on an unstable support. Keep effective footing and balance at all times. • Stay alert and watch what you are doing. • Do not operate the unit when fatigued or under the influence of drugs or alcohol. • Use only in dry locations. Do not expose to water or rain. • Use in well-lit areas.
	<p>PRESSURIZED ALUMINUM PARTS HAZARD</p> <p>Use of fluids that are incompatible with aluminum in pressurized equipment can cause serious chemical reaction and equipment rupture. Failure to follow this warning can result in death, serious injury, or property damage.</p> <ul style="list-style-type: none"> • Do not use 1,1,1-trichloroethane, methylene chloride, other halogenated hydrocarbon solvents or fluids containing such solvents. • Many other fluids may contain chemicals that can react with aluminum. Contact your material supplier for compatibility.
	<p>MOVING PARTS HAZARD</p> <p>Moving parts can pinch or amputate fingers and other body parts.</p> <ul style="list-style-type: none"> • Keep clear of moving parts. • Do not operate equipment with protective guards or covers removed. • Pressurized equipment can start without warning. Before checking, moving, or servicing equipment, follow the Pressure Relief Procedure in this manual. Disconnect power.
	<p>TOXIC FLUID OR FUMES HAZARD</p> <p>Toxic fluids or fumes can cause serious injury or death if splashed in the eyes or on skin, inhaled, or swallowed.</p> <ul style="list-style-type: none"> • Read MSDS's to know the specific hazards of the fluids you are using. • Store hazardous fluid in approved containers, and dispose of it according to applicable guidelines.
	<p>PERSONAL PROTECTIVE EQUIPMENT</p> <p>You must wear appropriate protective equipment when operating, servicing, or when in the operating area of the equipment to help protect you from serious injury, including eye injury, hearing loss, inhalation of toxic fumes, and burns. This equipment includes but is not limited to:</p> <ul style="list-style-type: none"> • Protective eyewear, and hearing protection. • Respirators, protective clothing, and gloves as recommended by the fluid and solvent manufacturer.

TrueCoat™ Component Identification

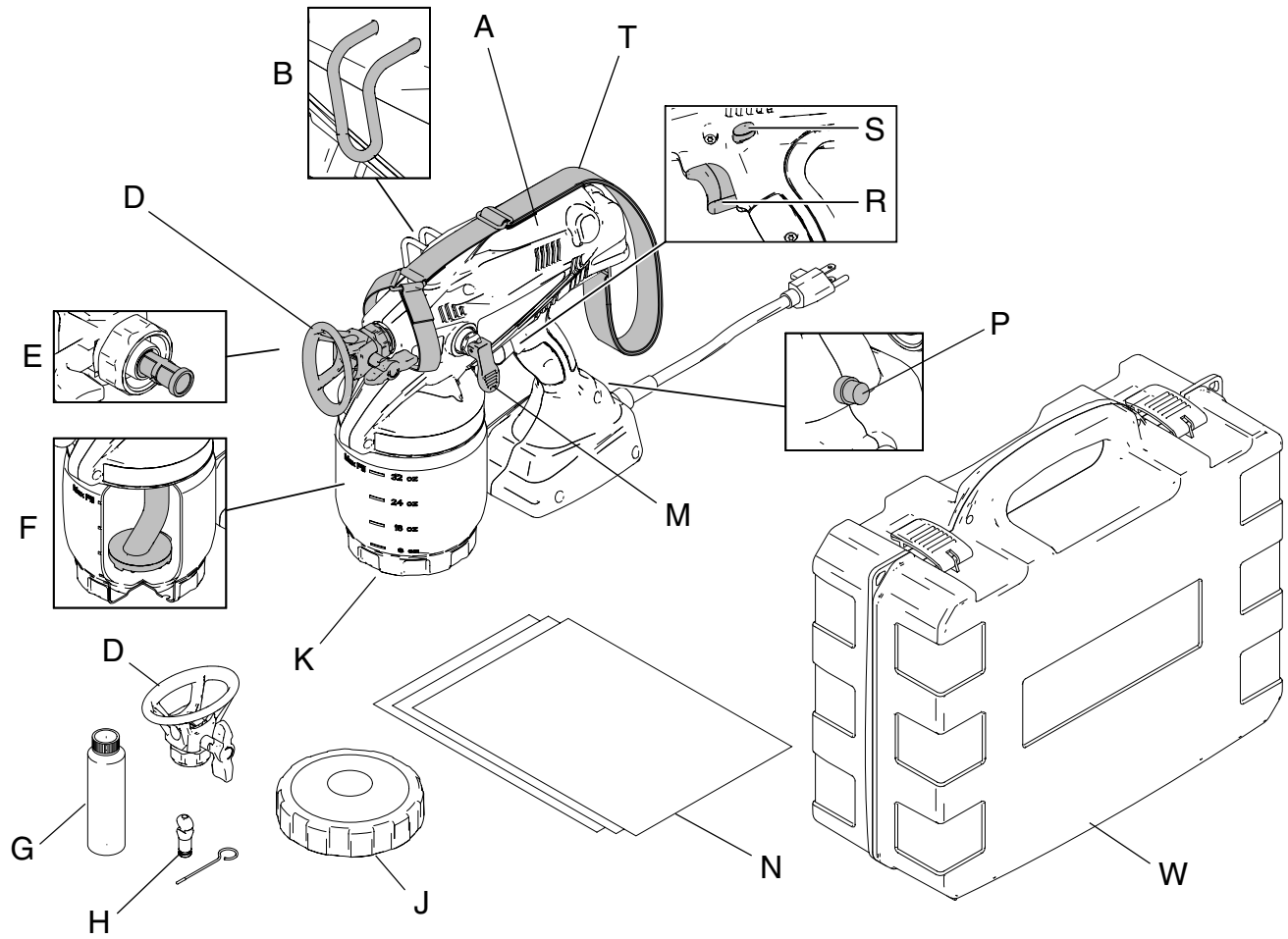


A	TrueCoat Paint Sprayer
B	Sprayer Hook
D	TrueCoat Spray Tip/Guard Assembly (517 included)
E	Tip Filter (*Reverse Threaded)
F	Suction Tube
G	Pump Armor Concentrate (4 oz.)
H	Fine-Finish Optimizer with Storage/Cleaning Tool

K	Material Cup (32 oz)
M	Control Lever
N	Material Cup Liners (3 included)
P	Sprayer Trigger
R	Sprayer Trigger Lock
S	Circuit Reset Button
T	TrueCoat Case

***NOTE:** Filter assembly is reverse-threaded. Turn left (or counter-clockwise) to tighten, turn right (or clockwise) to loosen.

TrueCoat™ Plus Component Identification







A	TrueCoat Plus Paint Sprayer
B	Sprayer Hook
D	TrueCoat Spray Tip/Guard Assembly (311, 517 included)
E	Tip Filter (*Reverse Threaded)
F	Suction Tube
G	Pump Armor Concentrate (4 oz.)
H	Fine-Finish Optimizer with Storage/Cleaning Tool
J	Material Cup Cover and Seal

K	Material Cup (32 oz)
M	Control Lever
N	Material Cup Liners (3 included)
P	Circuit Reset Button
R	Sprayer Trigger
S	Sprayer Trigger Lock
T	Shoulder Strap
W	TrueCoat Case

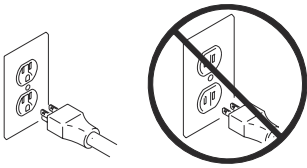
***NOTE:** Filter assembly is reverse-threaded. Turn left (or counter-clockwise) to tighten, turn right (or clockwise) to loosen.

Using Electrical Cords

Grounding and Electrical Requirements

				
Sprayer must be grounded. Grounding reduces the risk of static and electric shock by providing an escape wire for electrical current due to static build up or in the event of a short circuit.				

This 120 Vac sprayer requires a 120 Vac, 60 Hz, 15A circuit with a grounding receptacle.





Never use an outlet that is not grounded or an adapter.





Do not use the sprayer if the electrical cord has a damaged ground prong.

Power Cord

		
<p>Damaged or entangled cords increase the risk of electric shock.</p> <p>Do not abuse the sprayer cord.</p> <p>Do NOT use the cord for carrying, pulling, or unplugging the sprayer.</p> <p>Keep the cord away from heat, oil, sharp edges, and moving parts.</p> <p>Do not operate the sprayer with a damaged cord.</p>		

Extension Cord Requirements

		
<p>Only use an extension cord with an undamaged 3-prong plug.</p> <p>When operating sprayer outdoors, use an extension cord suitable for outdoor use.</p>		

NOTE: When using an extension cord, always use a cord coupler or an extension cord with locking plugs to ensure that your sprayer maintains power during operation.




Your extension cord must have an adequate wire size (AWG or American Wire Gauge) to be able to carry the current that your sprayer draws. A smaller gauge number has a greater capacity than a large one. For example, 14 gauge wire has a greater capacity than 16 gauge wire. An undersized extension cord will result in a drop in line voltage and loss of power, overheating, and possible damage to equipment.

When using more than one extension cord, make sure each individual cord contains at least the minimum wire size needed. The table below shows the correct size to use depending on extension cord size and gauge. If you are unsure, it is better to use a heavier gauge than needed. Remember, a smaller number indicates a larger gauge wire.

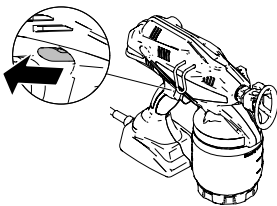
Extension Cord Gauge (AWG Minimum)	Extension Cord Length (Maximum)
18	50 ft (15 m)
16	100 ft (30 m)
14	200 ft (60m)

Common Procedures

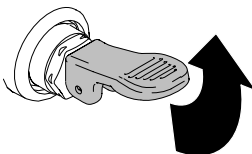
Pressure Relief Procedure

			
<p>Do not operate or spray near children. Do not aim the sprayer at, or spray any person or animal. Keep hands and other body parts away from the front of the sprayer. For example, do not try to stop the paint flow with any part of the body.</p> <p>This sprayer builds up an internal pressure of 2,000 psi during use. Follow this Pressure Relief Procedure whenever you stop spraying and before cleaning, checking, servicing, or transporting equipment to prevent serious injury.</p>			




1. Engage trigger lock.

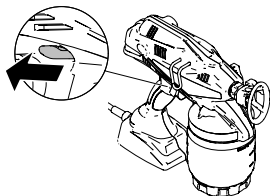


2. Put control lever UP to release pressure.

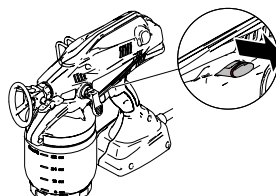


Trigger Lock

			
<p>Always engage the trigger lock when you stop spraying to prevent the sprayer from being triggered accidentally by hand, or if dropped or bumped.</p>			






Trigger Locked



Trigger Unlocked
(red ring is visible)

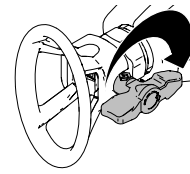
Spray Tip Position

			
<p>Always perform Pressure Relief Procedure before adjusting spray tip position.</p>			

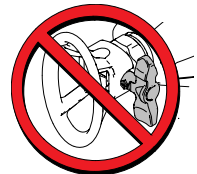
This sprayer comes with reversible spray tips. Tips can be rotated to two positions: SPRAY and UNCLOG.






Tip Forward
(SPRAY position)

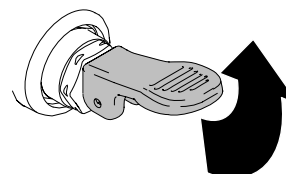


Tip Reversed
(UNCLOG position)



Control Lever Position

			
--	---	--	--



UP position
(Releases pump pressure)



DOWN position
(Ready to spray)

Setup

<p>Use only water-based or oil-based (mineral spirit-type) materials with flash point greater than 100° F (38° C). Do not use materials which state "FLAMMABLE" on the packaging. For more information about your material, request MSDS from distributor or retailer.</p>		
<p>Use oil-based material outdoors or in a well-ventilated indoor area with a flow of fresh air.</p>		
<p>Keep spray area well-ventilated. Keep a good supply of fresh air moving through the area.</p>		

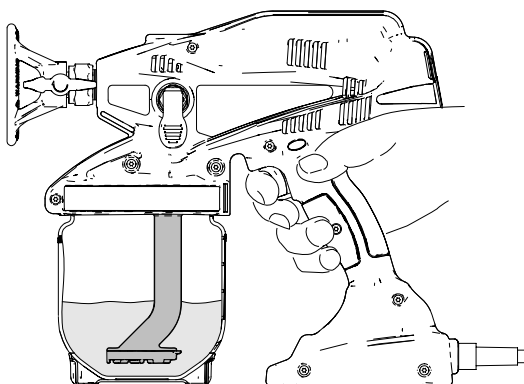
NOTICE
<p>Your sprayer is NOT compatible with harsh cleaners such as chlorine bleach. Using these cleaners will cause damage to the sprayer.</p>

Overheating Protection

This sprayer has a built-in protective device to prevent damage from overheating. The sprayer may automatically shut down after heavy use. If this happens, allow the sprayer to cool down for 20-30 minutes and resume spraying.

Installing Suction Tube

Aim the inlet of the suction tube at the front of the material cup (towards Spray Tip/Guard Assembly) during installation.



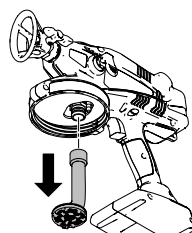
Spraying Stains or Clear Coats (Fine-Finish Optimizer)

The Fine-Finish Optimizer must be installed and used when spraying thin material (similar to water) such as stain or clear coats. The Fine-Finish Optimizer restricts the material flow resulting in a finer quality finish.

NOTICE
<p>Failure to install the Fine-Finish Optimizer when using the NAR311 tip or when spraying thin materials will cause the motor to overheat and shutdown until it cools.</p>

Installation

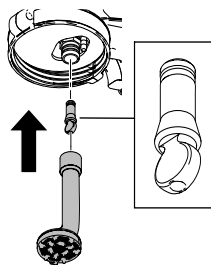
1. Remove material cup and suction tube.



2. Remove the cleaning tool before installing the Fine-finish Optimizer into the sprayer.

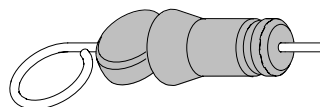


3. Push Fine-Finish Optimizer into pump inlet until completely engaged and re-install suction tube.



Cleanup/Storage

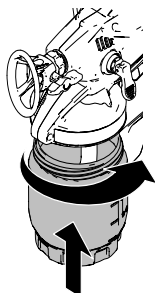
Be sure to remove and clean the Fine-Finish Optimizer immediately after use. Store the Fine-Finish Optimizer on the Storage/cleaning Tool supplied to keep the hole clear of dried material.



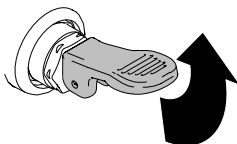
Sprayer Setup

This sprayer arrives from the factory with a small amount of test material in the system. **It is important that you flush this material or any storage fluid from the sprayer before using it.**

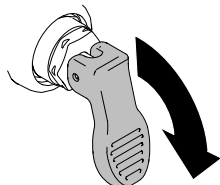
1. Plug sprayer into a properly-grounded outlet.
2. Fill material cup with water and thread onto sprayer.



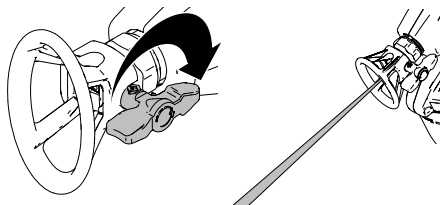
3. Put control lever to UP position, then hold trigger in for 10 seconds.



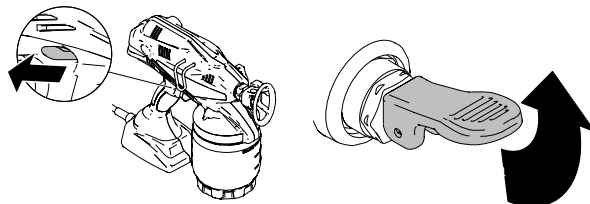
4. Put control lever DOWN to spray position.



5. Reverse spray tip to UNCLOG position and trigger sprayer into a waste area.



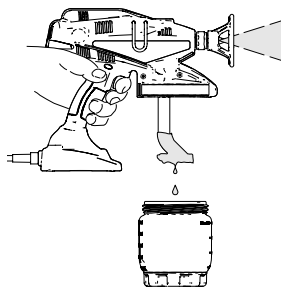
6. Engage trigger lock and put control lever UP to release pressure.



7. Unscrew and remove material cup.



8. Disengage trigger lock, put control lever DOWN, hold sprayer slightly above material cup, and pull trigger to discharge fluid from pump.



9. Discard material in the cup.

Materials



Use only water-based or oil-based (mineral spirit-type) materials with flash point greater than 100° F (38° C). Do not use materials which state "FLAMMABLE" on the packaging. For more information about your material, request MSDS from distributor or retailer.

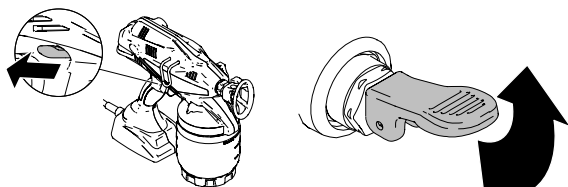
Use oil-based material outdoors or in a well-ventilated indoor area with a flow of fresh air.

Keep spray area well-ventilated. Keep a good supply of fresh air moving through the area.

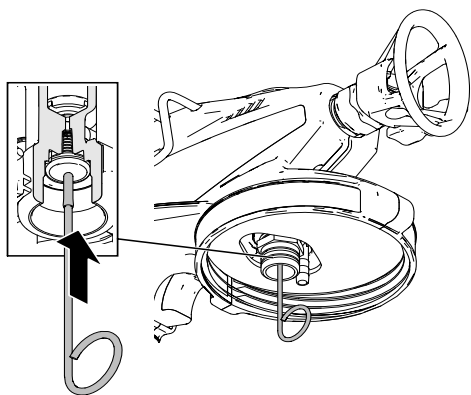
- When spraying **water-based** materials, flush the sprayer thoroughly with water.
- When spraying **non-water-based** materials, flush the sprayer thoroughly with mineral spirits or compatible, oil-based flushing fluid.

Starting a New Job (or Refilling the Cup)

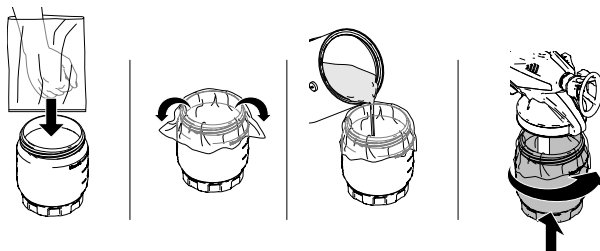
1. Engage trigger lock and put control lever UP to release pressure.



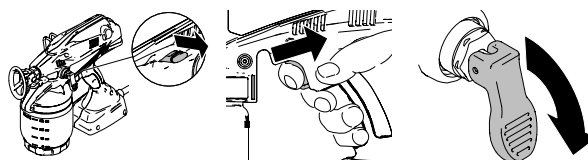
2. Use your Fine-Finish Optimizer cleaning tool to lightly push on inlet valve to make sure it moves up and down freely.



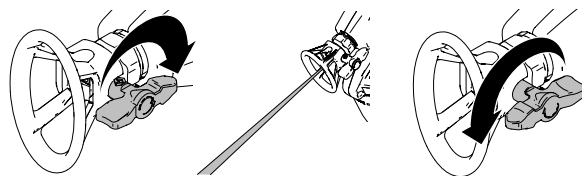
3. Install material cup liner, fill with material, and thread onto sprayer.



4. To begin using, disengage trigger lock and trigger sprayer for 5-10 seconds. Then release trigger and put control lever DOWN to spray position.



5. Reverse spray tip to UNCLOG position and spray into waste area for 5 seconds. Then rotate tip back to SPRAY position. **NOTE:** Failure to perform this operation could result in poor spray pattern.



You are now ready to spray! If sprayer fails to prime, follow the **Alternative Priming Method** (page 23) and/or **Inlet Valve Cleaning** (page 24).

NOTE: If the sprayer is angled or tilted too far, the suction tube will lose contact with the material and the sprayer will stop spraying.



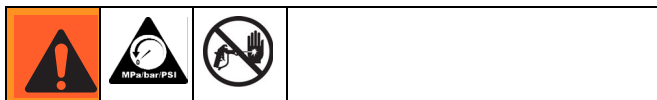
Install Tip/Guard Assembly (if not installed)

Reversible Tip Selection Chart

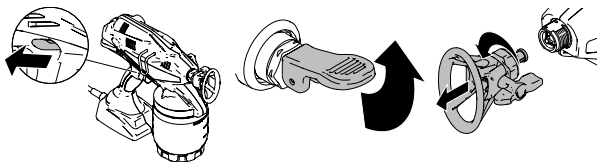
MATERIALS		
*Thin	Medium	Heavy
Thin stains, semi-transparent stains	Enamels, solid stains, thin latex	Heavy latex
311	315, 515	517

*For thin materials install **Fine-Finish Optimizer**, page 10.

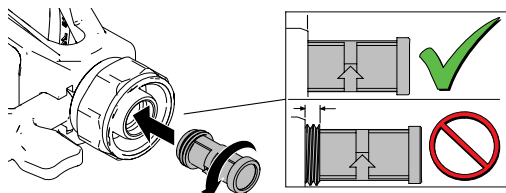
NOTE: Spraying thicker materials with a 311 tip may cause the motor to overheat. Use the **Reversible Tip Chart** to determine the correct tip for your application. If motor does overheat, allow sprayer to cool for 20-30 minutes before operating.



1. Engage trigger lock and put control lever UP to release pressure in the sprayer.



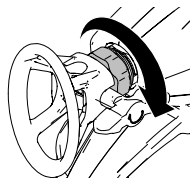
2. Install filter to Spray Tip/Guard Assembly. Make sure filter is fully installed into sprayer. **NOTE:** Filter assembly is reverse-threaded. **Turn left** (or counter-clockwise) to install. **Turn right** (or clockwise) to remove.



NOTICE

Make sure filter is completely screwed into the Tip/Guard Assembly to avoid splattering material or damage to the filter.

3. Firmly screw Tip/Guard Assembly onto sprayer. Tighten retaining nut until completely engaged with sprayer. If Tip/Guard Assembly is not fully tightened, poor spray results and possible damage to the sprayer could occur.

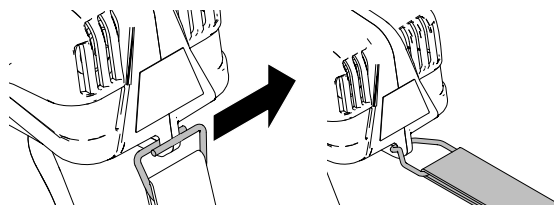


NOTICE

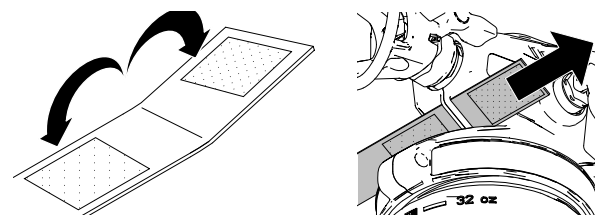
The tip is a permanently attached to the guard. Removing the tip from the guard will result in damage to tip assembly.

Shoulder Strap Installation

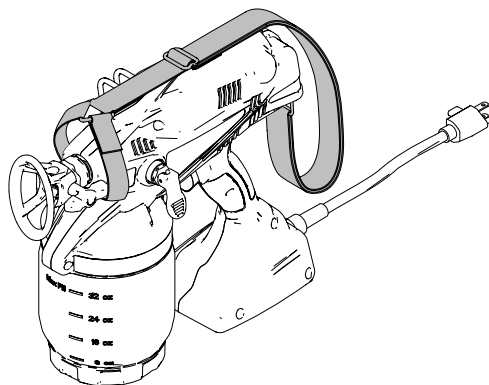
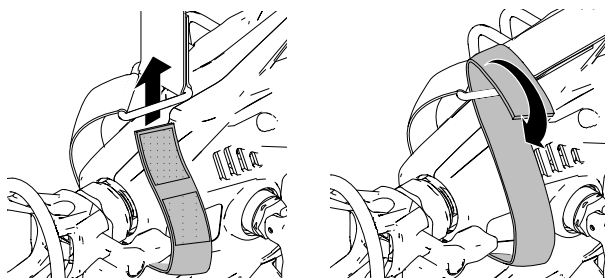
1. Attach the metal eyelet to the back of the sprayer.



2. Open the velcro end of the strap, then route it through the slot under the tip of the sprayer.



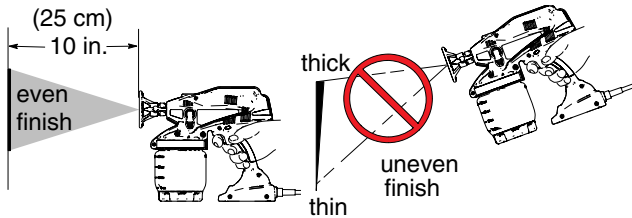
3. Route velcro **up** through the metal triangle, then fold **down** and attach velcro to strap.



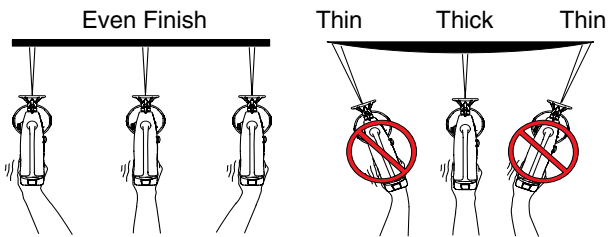
Basic Spraying Techniques

NOTE: Use a piece of scrap cardboard to practice these basic spraying techniques before you begin spraying the surface. **Anything you don't want painted that is in the area of your spraying surface should be covered or removed.**

Hold sprayer at least 10 in. (25 cm) from surface and adjust accordingly to achieve desired results. Aim sprayer straight at surface. Tilting sprayer to direct spray angle causes an uneven finish.



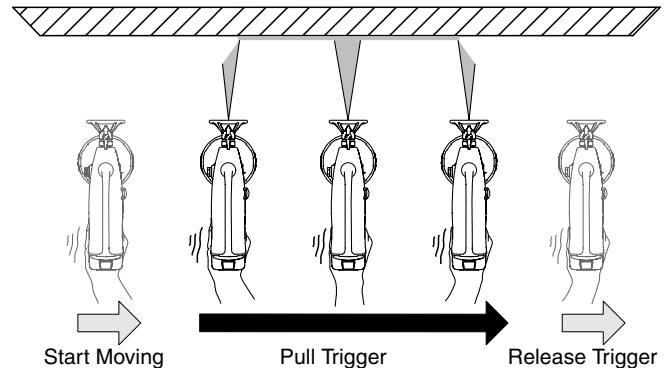
Flex your wrist while moving your arm to keep the sprayer pointed straight. Tilting the sprayer or spraying at an angle causes an uneven finish.



NOTE: How fast you move the sprayer will affect spray application. If material is pulsating, you are moving too fast. If material drips, you are moving too slow. See **Troubleshooting**, page 20.

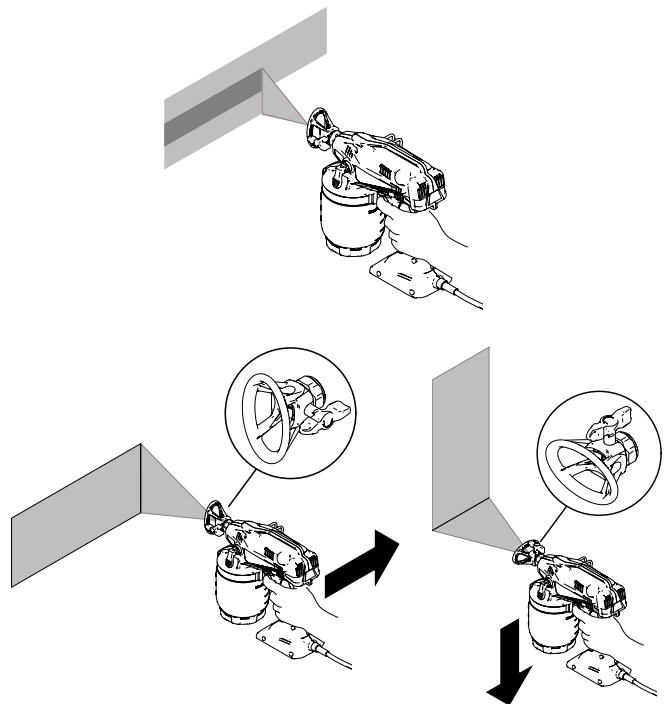
Triggering Sprayer

To achieve even spraying, pull trigger after starting the stroke. Release trigger before the end of the stroke. Sprayer must be moving when trigger is pulled and released.





Aiming Sprayer

Aim tip of sprayer at bottom edge of previous stroke, overlapping each stroke by half.

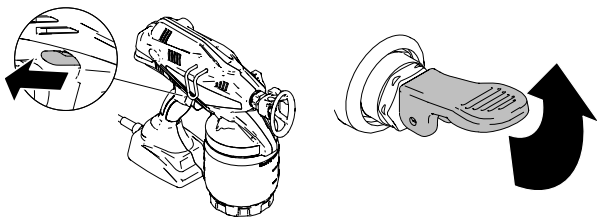


Unclogging Spray Tip/Guard Assembly

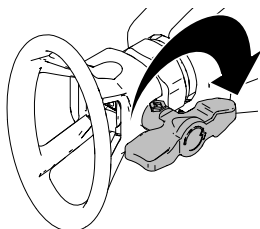
		
<p>Do not operate or spray near children. Do not aim the sprayer at, or spray any person or animal. Keep hands and other body parts away from the discharge. For example, do not try to stop leaks with any part of the body.</p>		

Occasionally, debris from material can accumulate and clog the spray tip. Perform the following steps to unclog the tip.

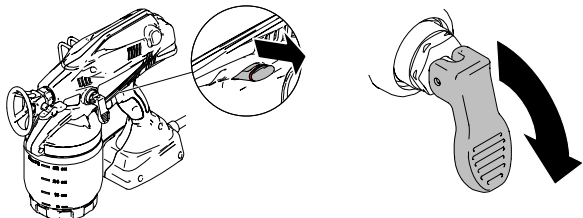
1. To unclog tip obstruction, engage trigger lock and pull control lever UP to release pressure.



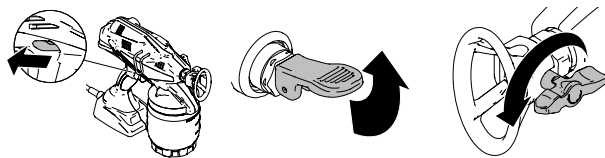
2. Reverse spray tip to UNCLOG position.



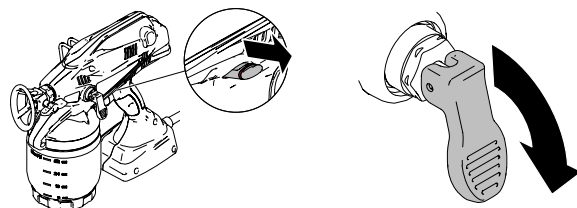
3. Aim sprayer at waste area, disengage trigger lock, and put control lever DOWN to spray position. Pull trigger to clear clog.



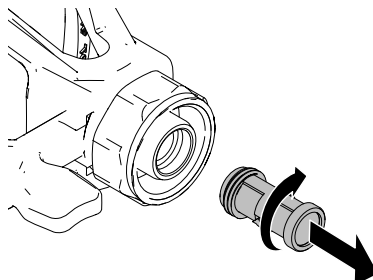
4. Engage trigger lock. Put control lever UP to release pressure and rotate spray tip back to SPRAY position.



5. Disengage trigger lock, put control lever DOWN to spray position, and resume spraying.

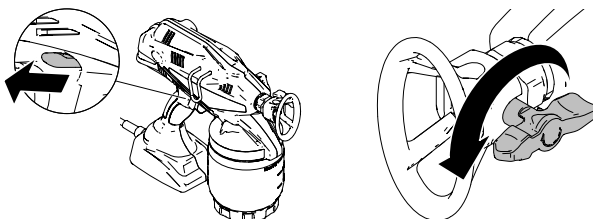


6. If tip is still clogged, you may have to repeat steps 1 - 5 and rotate the tip from SPRAY to UNCLOG several times. Repeat step 1 to release pressure, remove and clean filter, or replace with new tip assembly.



NOTE: Filter assembly is reverse-threaded:
Turn left (or counter-clockwise) to install.
Turn right (or clockwise) to remove.

7. If obstruction is cleared, engage trigger lock and rotate arrow-shaped handle back to SPRAY position.



Shutdown and Cleaning

NOTICE

Failure to properly clean sprayer after each use will result in hardened materials, damage to the sprayer, and the warranty will no longer be valid.

Flushing Sprayer



Use only water-based or oil-based (mineral spirit-type) materials with flash point greater than 100° F (38° C). Do not use materials which state "FLAMMABLE" on the packaging. For more information about your material, request MSDS from distributor or retailer.

Use oil-based material outdoors or in a well-ventilated indoor area with a flow of fresh air.

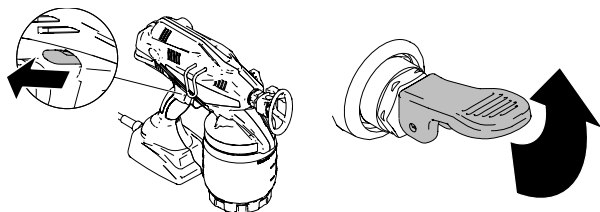
Keep spray area well-ventilated. Keep a good supply of fresh air moving through the area.

NOTICE

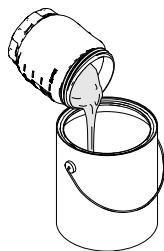
Protect the internal parts of this sprayer from water.

Do not submerge the sprayer in cleaning fluid. Openings in shroud allow cooling of mechanical parts and electronics inside. If water gets into these openings, the sprayer could malfunction or become permanently damaged.

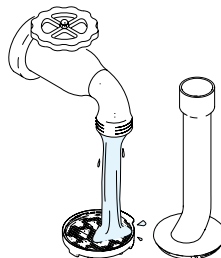
1. Engage trigger lock and pull control lever UP to release pressure.



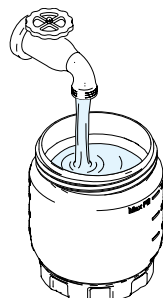
2. Remove material cup and properly dispose cup liner or excess material.



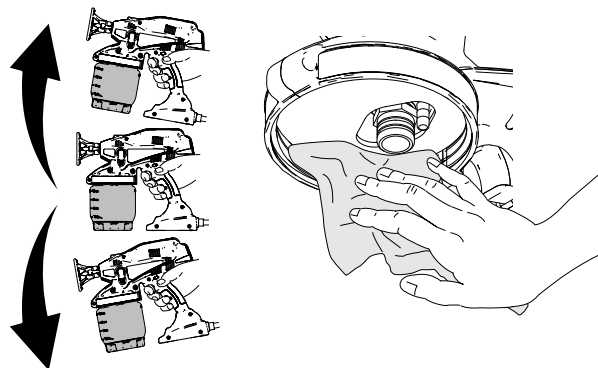
3. Remove and clean sprayer intake tube and screen with water (or flushing fluid) and a brush every time you flush the sprayer. Reconnect intake tube.



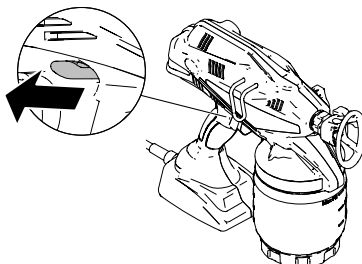
4. Clean cup if not using a liner, and fill with water or appropriate flushing fluid.



5. Reconnect material cup and shake sprayer to move clean water around and clean all areas inside of cup and underside of sprayer.



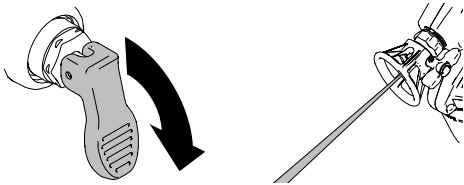
6. Disengage trigger lock and trigger sprayer for approximately 15 seconds. Engage trigger lock.



7. Discard contaminated fluid and refill with appropriate flushing fluid.
8. Disengage trigger lock, reverse tip to UNCLOG position, and pull trigger for 5 seconds to prepare sprayer.



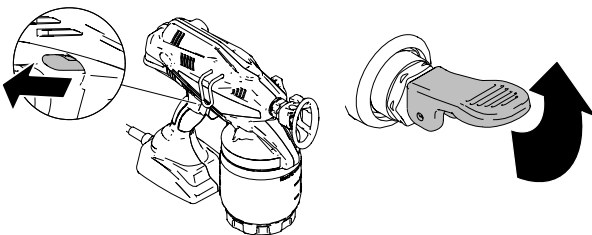
9. Put control lever DOWN to spray position. Trigger sprayer into waste area until no paint appears in water or flushing fluid.



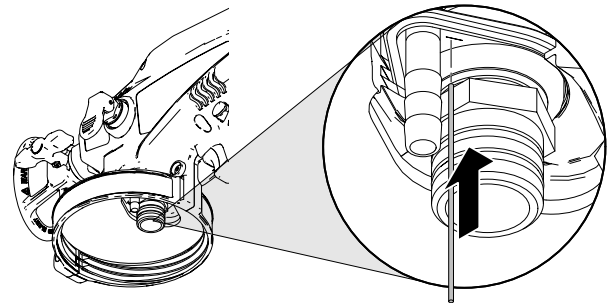
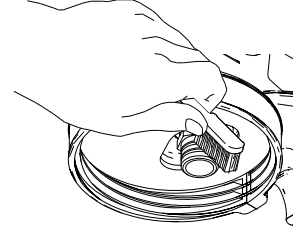
To avoid serious injury or damage to equipment, do not expose the sprayer electronics to flushing solvents. Keep sprayer **at least 10 in.** above the rim of the container when flushing.

Keep spray area well-ventilated. Keep a good supply of fresh air moving through the area.

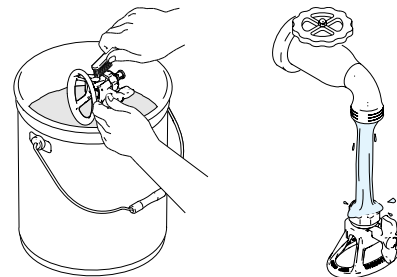
10. Engage trigger lock and put control lever UP to release pressure.



11. Remove material cup and discard used fluid.
12. Use a soft brush to clean the black rubber inlet seal. If the vent holes become clogged, use the Fine Finish Optimizer cleaning tool or a paper clip to clear the holes.



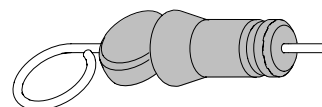
13. Remove Spray Tip/Guard Assembly and clean with water or flushing fluid. A soft brush can be used to loosen and remove dried material if needed. Run underwater and use a soft brush to clean the filter.



NOTICE

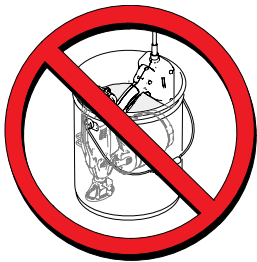
The tip is a permanently attached to the guard. Removing the tip from the guard will result in damage to tip assembly.

14. Replace tip assembly.
15. If you used the Fine-Finish Optimizer, remove and clean optimizer with water (or flushing fluid) and a brush. Reconnect intake tube.



Cleaning Sprayer Exterior

- Wipe paint off outside of sprayer using a soft cloth moistened with water or flushing fluid. Do NOT submerge the sprayer.



Tips

- Tips will require replacement depending on abrasiveness of paint.
- Do not spray with worn tip. See **Troubleshooting**, page 20.

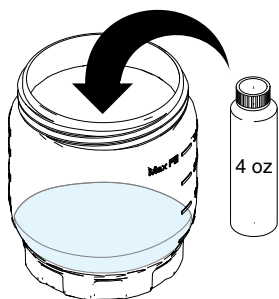
Storage



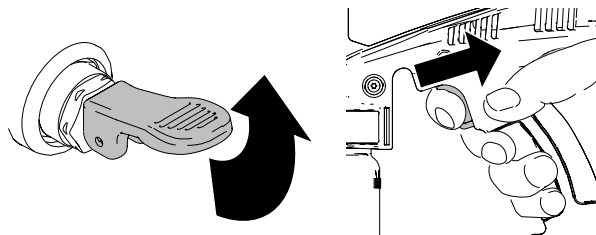
NOTICE

Failure to store with sprayer with Pump Armor will result in operational problems the next time you spray. Always circulate Pump Armor through the sprayer after cleaning. Water left in the sprayer will corrode and damage the pump.

- Dilute 4 oz. bottle of Pump Armor Concentrate with an additional 4 oz. of water in material cup.



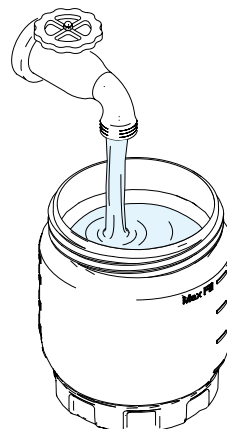
- Thread cup into sprayer, put control lever to UP position and squeeze sprayer trigger for approximately 10 seconds.



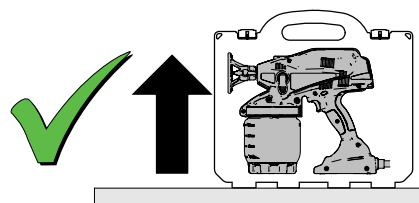
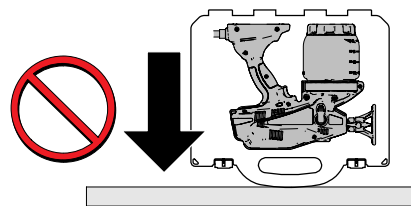
- Reverse spray tip to UNCLOG position, put control lever DOWN to spray position, and aim sprayer into waste area. Pull trigger for 1-2 seconds.



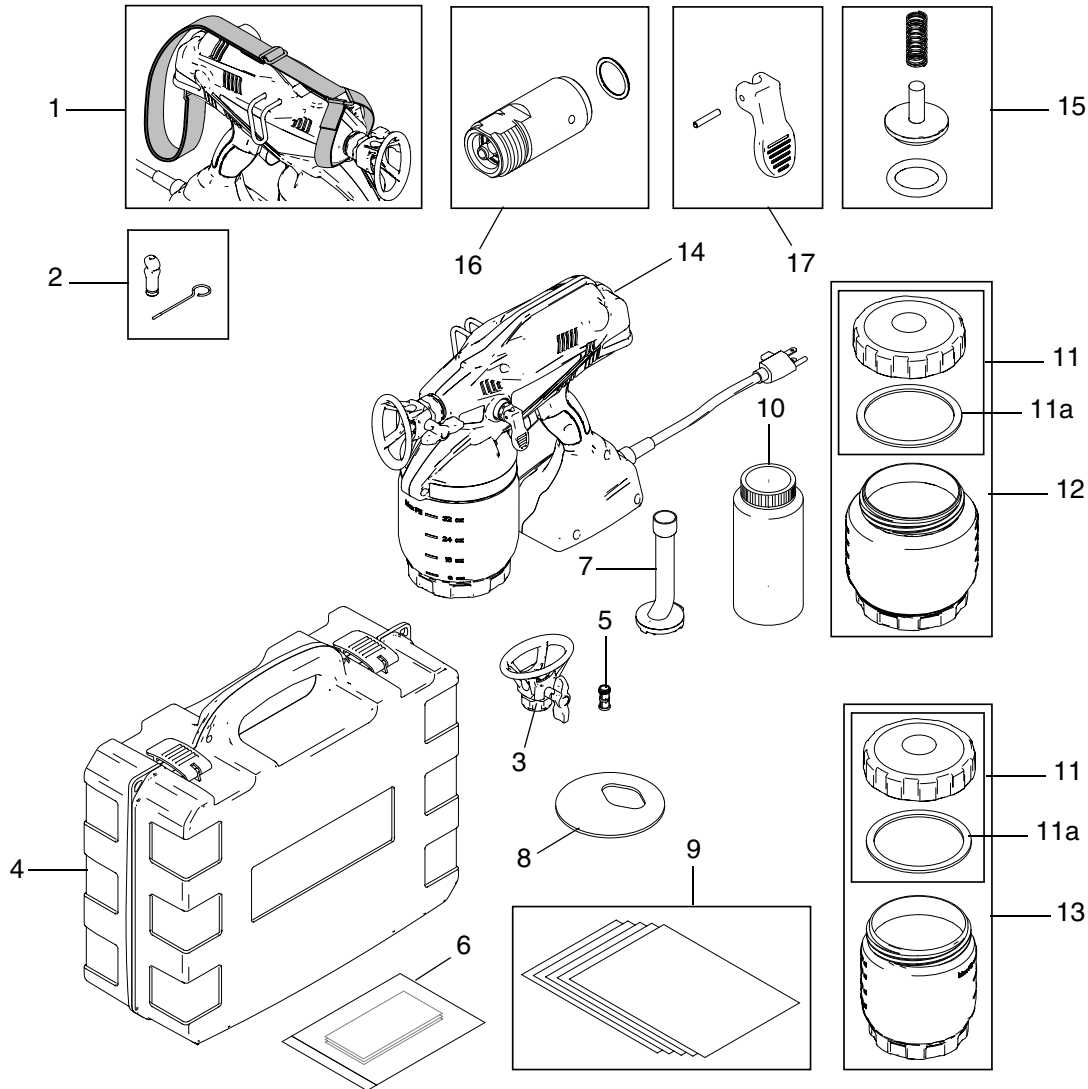
- Properly dispose of used Pump Armor mixture from material cup and rinse cup with water.



- Store sprayer indoors in a cool, dry place. Store storage case in an **upright position only**.



Replacement Parts and Kits



Ref.	Part	Description
1	24E377	Shoulder Strap
2	24F045	Fine Finish Optimizer (with Cleaning Tool)
3		TrueCoat Tip/Guard Assembly
	NAR311	311
	NAR315	315
	XWD515	515
	XWD517	517
4	24F078	Storage Case
5		Tip Filter
	24E376	Kit, 1-pack
	24F039	Kit, 3-pack
6▲	24E609	Warning Labels, replacement kit
7	24F076	Suction Tube with screens and o-rings
8	16E403	Sprayer Cup Seal
9	16D562	Liner, replacement (10 pack)

Ref.	Part	Description
10	243103	Pump Armor (32 oz.)
11	24D425	Cover with seal (included in 12 and 13)
11a	16C650	Material Cup Cover Seal (included 12 and 13)
12	24E375	Material Cup (48 oz) cover and seal
13	24E374	Material Cup (32 oz) cover and seal
	106553	Suction Tube o-ring (not shown)
14	262460	SPRAYER, replacement, TrueCoat
	262459	SPRAYER, replacement, TrueCoat Plus
15	262602	Inlet Valve Kit
16	262438	Needle Assembly Kit
17	262601	Prime Valve Handle

▲ Replacement Danger and Warning labels, tags, and cards are available at no cost.

Troubleshooting

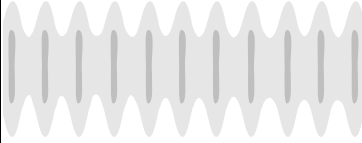







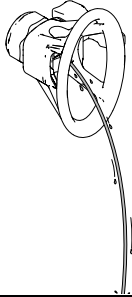
Check everything in this Troubleshooting Table before you bring the sprayer to an authorized service center.

Problem	Cause	Solution
Sprayer makes no sound when trigger is pulled	Trigger is locked.	Disengage trigger lock. See page 9.
	Sprayer is not receiving power.	Plug in sprayer or check outlet for power.
	Sprayer motor is overheated.	Wait 20-30 minutes for motor to cool.
	Sprayer circuit breaker has tripped.	Push and hold circuit reset button (see pages 6 and 7).
Sprayer makes sound but no material is sprayed when trigger is pulled	Sprayer has not been Setup.	Setup the sprayer. See Starting a new Job (or Refilling the Cup) , page 12. If sprayer fails to prime, follow the Alternative Priming Method (page 23) and/or Inlet Valve Cleaning (page 24).
	Control lever is in UP position.	Pull control lever DOWN to spray position.
	Suction Tube is missing or improperly installed.	Make sure Suction Tube is properly installed.
	Inlet valve is stuck from material residue left in sprayer.	Use a pencil or thin rod to lightly push on inlet valve to make sure it moves up and down freely, see page 12. Inlet valve may need to be removed and cleaned. See Inlet Valve Cleaning , page 24.
	Tip is not in SPRAY position.	Turn tip to SPRAY position.
	Tip is clogged.	See Unclogging Tip/Guard Assembly , page 15.
	Suction Tube screen is clogged or vent holes in black rubber inlet seal are clogged.	See Shutdown and Cleaning , page 16.
	Sprayer has been tilted too far and suction tube has lost contact with material.	Make sure cup is filled with material. Do not tilt the cup too far. Setup the sprayer. See Starting a new Job (or Refilling the Cup) , page 12.
	No or low material in cup.	Refill cup with material.
	Tip filter is clogged.	Remove and clean tip filter. See Unclogging Tip/Guard Assembly , page 15.
	Fine Finish Optimizer is installed while using an incompatible material.	Make sure compatible material is being used. See Reversible Tip Selection Chart , page 13.
	Suction Tube o-rings are damaged or missing.	Replace Suction Tube and o-rings.
	Pump is clogged, frozen, or has debris inside.	Flush the pump. See Setup , page 10.
	Sprayer has reached maximum life.	Replace sprayer.
	Material is leaking from hole in front of sprayer.	Replace sprayer.

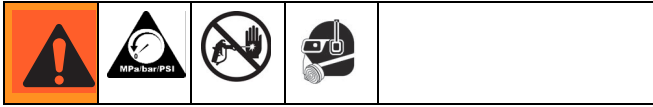
Problem	Cause	Solution
Sprayer sprays with poor results	Tip is partially clogged	See Unclogging Tip/Guard Assembly , page 15.
	Tip is not in correct position	Rotate tip to SPRAY position.
	Incorrect tip for application of material.	See Reversible Tip Selection Chart , page 13.
	Tip filter is partially clogged	Clean or replace filter. See page 15.
	Suction Tube screen is partially clogged.	Clean or replace Suction Tube. See page 16.
	Fine Finish Optimizer is partially clogged.	Clean or replace Fine Finish Optimizer. See page 10.
	Fine Finish Optimizer is installed while using an incompatible material.	Make sure compatible material is being used. See Reversible Tip Selection Chart , page 13.
	Tip is worn or damaged	Replace tip. See Install Tip/Guard Assembly , page 13.
	Inlet or Outlet Valves are worn.	Replace sprayer.
	Sprayer is pulsating while spraying water.	Fine-Finish Optimizer is not installed. See page 10.
Paint leaks from sprayer trigger area.	Sprayer has reached its maximum life.	Replace sprayer.

Spray Pattern Diagnostics

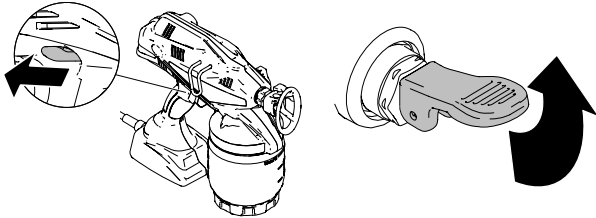
Problem	Cause	Solution
Spray pattern is pulsating: 	The Fine-Finish Optimizer is installed while using thick material. Operator is moving too fast while spraying.	Make sure material and tip are compatible. See Reversible Tip Selection Chart , page 13. Slow speed of movement.
Spray pattern has tails: 	Fine Finish Optimizer is installed while using an incompatible material. Fine Finish Optimizer is partially clogged. Material not compatible with sprayer. Inlet or Outlet Valves are worn.	Make sure compatible material is being used. See Reversible Tip Selection Chart , page 13. Clean or replace Fine Finish Optimizer. See page 10. Switch material. Replace sprayer.

Problem	Cause	Solution
Spray pattern has dripping: 	Sprayer is moving too slow for material. Sprayer is too close to target surface. Holding trigger while changing spray direction. Incorrect tip for application of material. Tip is worn or damaged.	Move sprayer faster while spraying. Move sprayer away from surface (10 in). Release trigger when changing directions. See Reversible Tip Selection Chart , page 13. Replace tip. See Install Tip/Guard Assembly , page 13.
Spray pattern is too narrow: 	Sprayer is too close to target surface. Incorrect tip for application of material. Tip is worn or damaged.	Move sprayer away from surface (10 in). See Reversible Tip Selection Chart , page 13. Replace tip. See Install Tip/Guard Assembly , page 13.
Spray pattern is too wide: 	Sprayer is too far away from target surface. Incorrect tip for application of material.	Move sprayer closer to surface. See Reversible Tip Selection Chart , page 13.
Spray pattern “spits” at the end: 	Excess material has accumulated on Spray Tip/Guard Assembly. Tip filter is partially clogged. Tip/Guard Assembly not threaded completely onto sprayer. Seat is worn.	See Shutdown and Cleaning , page 16. Clean or replace filter. See page 15. See Install Tip/Guard Assembly , page 13. Replace Spray tip.
Tip continues to drip or ooze material after trigger is released: 	Sprayer is worn out. Tip/Guard Assembly not threaded completely onto sprayer.	Replace sprayer. See Install Tip/Guard Assembly , page 13.
Spray pattern does not adequately cover target surface	Fine Finish Optimizer is installed while using an incompatible material. Sprayer is worn out.	Make sure compatible material is being used. See Reversible Tip Selection Chart , page 13. Replace sprayer.

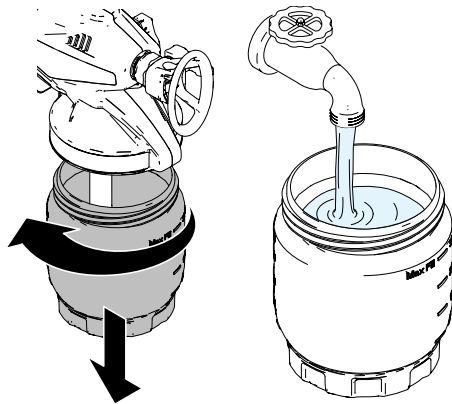
Alternate Priming Method



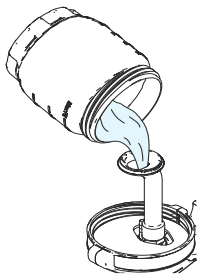
1. Engage trigger lock and put prime/relief valve UP to release pressure.



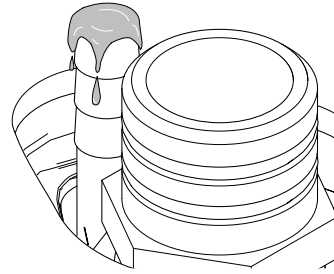
2. Remove material cup and fill with flushing material.



3. With sprayer in prime mode, turn sprayer upside-down, remove strainer and slowly pour flushing material into the intake tube until full.

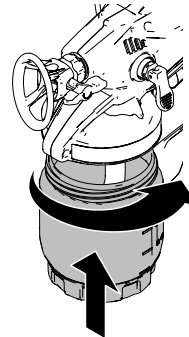


4. Hold sprayer above sink or waste area, disengage the trigger lock, and quickly trigger sprayer until material comes out of the drain tube.

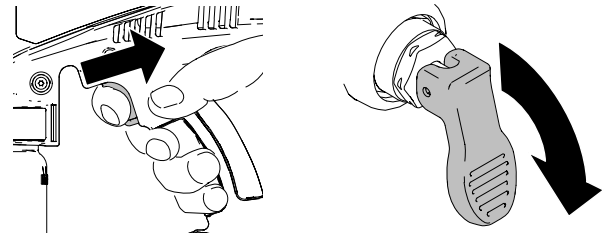


NOTE: Material can shoot out of the drain tube when performing this procedure. Be sure to wear appropriate safety equipment and point drain tube away from yourself when pulling the trigger,

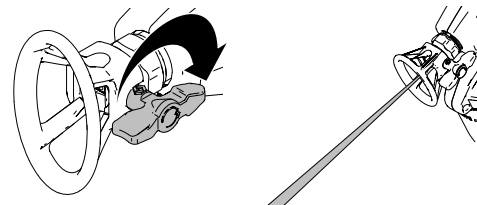
5. Thread the material cup back onto sprayer.



6. Trigger the gun for 10 seconds then release the trigger and put the prime/relief valve DOWN to spray position.



7. Reverse spray tip to UNCLOG position and spray into waste area for five seconds to ensure sprayer has primed.

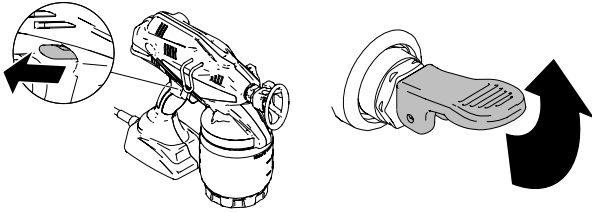


8. Sprayer is now ready to spray. Follow **Starting New Job** instructions on page 12.

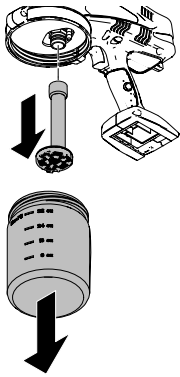
Inlet Valve Cleaning

Removal

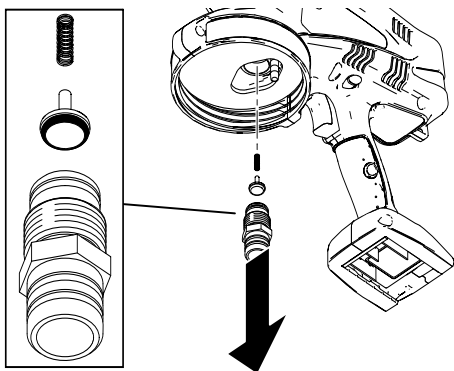
1. Engage trigger lock and pull relief valve UP to release pressure.



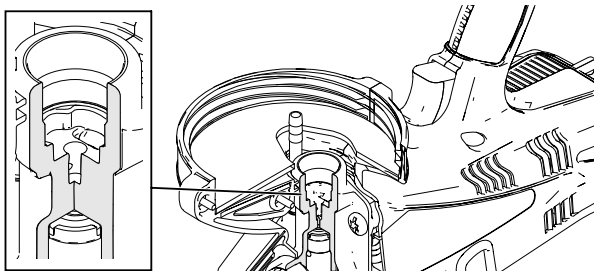
2. Remove material cup and suction tube.



3. Hold sprayer upside-down and use wrench or socket to loosen and remove inlet fitting, inlet valve, and spring.



NOTE: Make sure the spring also comes out. Use needle-nose pliers to remove if needed. Inlet cavity should be completely empty (as shown below).

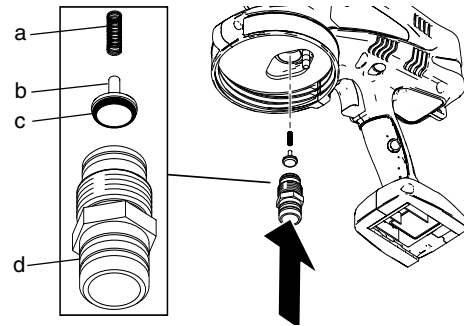


4. Clean as much excess material from pump cavity as possible. Make sure you also clean spring (a), o-ring (c), and top of inlet fitting (d).

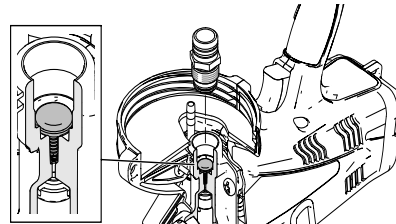
Installation

NOTE: Before installing, make sure o-ring (c) is installed on inlet valve (b).

1. Place inlet valve (b) with spring (a) on top of inlet fitting (d). Push inlet fitting up into pump cavity.



2. Hold inlet in place and turn sprayer upside-down. Remove inlet fitting and visually check to see that inlet valve has seated correctly.

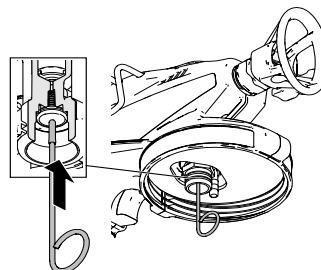


3. Replace inlet fitting and use wrench and socket to tighten to 10 ft-lb.

NOTICE

Do **NOT** over-tighten inlet fitting. Damage to the equipment will occur.

4. Use your Fine-Finish Optimizer cleaning tool to lightly push on inlet valve to make sure it moves up and down freely.



Technical Data

Sprayer:	
Maximum working pressure	2000 psi (137.8 bar, 13.7 MPa)
Maximum amperage	4 amps
Weight	5.89 lb (2.67 kg)
Dimensions:	
Length	13.25 in. (33.6 cm)
Width	5.0 in. (12.7 cm)
Height	10.75 in. (27.3 cm)
Storage temperature range ♦❖	32° to 122°F (0° to 50°C)
Operating temperature range ✓	40° to 90° F (4° to 32°C)
Storage Humidity Range	0% to 95% relative humidity, non-condensing
Duty Cycle	50%
Power Cord	18 AWG, 3-wire, 18 in. (46 cm)
Electrical Power Requirement	120 Vac, 60 Hz, 15A, 1 phase

- ♦ Pump damage will occur if fluid freezes in pump.
- ❖ Damage to plastic parts may result if impact occurs in low temperature conditions.
- ✓ Changes in paint viscosity at very low or very high temperatures can affect sprayer performance.

Notes

This image shows a blank sheet of white paper with horizontal ruling lines. The lines are evenly spaced and run across the width of the page. There are no margins, text, or other markings on the paper.

Notes

[illegible]

Graco Standard Warranty

Graco warrants all equipment referenced in this document which is manufactured by Graco and bearing its name to be free from defects in material and workmanship on the date of sale to the original purchaser for use. With the exception of any special, extended, or limited warranty published by Graco, Graco will, for a period of twelve months from the date of sale, repair or replace any part of the equipment determined by Graco to be defective. This warranty applies only when the equipment is installed, operated and maintained in accordance with Graco's written recommendations.

This warranty does not cover, and Graco shall not be liable for general wear and tear, or any malfunction, damage or wear caused by faulty installation, misapplication, abrasion, corrosion, inadequate or improper maintenance, negligence, accident, tampering, or substitution of non-Graco component parts. Nor shall Graco be liable for malfunction, damage or wear caused by the incompatibility of Graco equipment with structures, accessories, equipment or materials not supplied by Graco, or the improper design, manufacture, installation, operation or maintenance of structures, accessories, equipment or materials not supplied by Graco.

This warranty is conditioned upon the prepaid return of the equipment claimed to be defective to an authorized Graco distributor for verification of the claimed defect. If the claimed defect is verified, Graco will repair or replace free of charge any defective parts. The equipment will be returned to the original purchaser transportation prepaid. If inspection of the equipment does not disclose any defect in material or workmanship, repairs will be made at a reasonable charge, which charges may include the costs of parts, labor, and transportation.

THIS WARRANTY IS EXCLUSIVE, AND IS IN LIEU OF ANY OTHER WARRANTIES, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO WARRANTY OF MERCHANTABILITY OR WARRANTY OF FITNESS FOR A PARTICULAR PURPOSE.

Graco's sole obligation and buyer's sole remedy for any breach of warranty shall be as set forth above. The buyer agrees that no other remedy (including, but not limited to, incidental or consequential damages for lost profits, lost sales, injury to person or property, or any other incidental or consequential loss) shall be available. Any action for breach of warranty must be brought within two (2) years of the date of sale.

GRACO MAKES NO WARRANTY, AND DISCLAIMS ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, IN CONNECTION WITH ACCESSORIES, EQUIPMENT, MATERIALS OR COMPONENTS SOLD BUT NOT MANUFACTURED BY GRACO. These items sold, but not manufactured by Graco (such as electric motors, switches, hose, etc.), are subject to the warranty, if any, of their manufacturer. Graco will provide purchaser with reasonable assistance in making any claim for breach of these warranties.

In no event will Graco be liable for indirect, incidental, special or consequential damages resulting from Graco supplying equipment hereunder, or the furnishing, performance, or use of any products or other goods sold hereto, whether due to a breach of contract, breach of warranty, the negligence of Graco, or otherwise.

FOR GRACO CANADA CUSTOMERS

The Parties acknowledge that they have required that the present document, as well as all documents, notices and legal proceedings entered into, given or instituted pursuant hereto or relating directly or indirectly hereto, be drawn up in English. Les parties reconnaissent avoir convenu que la rédaction du présente document sera en Anglais, ainsi que tous documents, avis et procédures judiciaires exécutés, donnés ou intentés, à la suite de ou en rapport, directement ou indirectement, avec les procédures concernées.

Graco Information

For the latest information about Graco products, visit www.graco.com.

Contact **Graco Customer Service** at 1-888-541-9788.

*All written and visual data contained in this document reflects the latest product information available at the time of publication.
Graco reserves the right to make changes at any time without notice.*

Original instructions. This manual contains English. MM 3A0159

Graco Headquarters: Minneapolis
International Offices: Belgium, China, Japan, Korea

GRACO INC. AND SUBSIDIARIES • P.O. BOX 1441 • MINNEAPOLIS MN 55440-1441 • USA

Copyright 2011, Graco Inc. All Graco manufacturing locations are registered to ISO 9001.

www.graco.com
Revised 11/2011