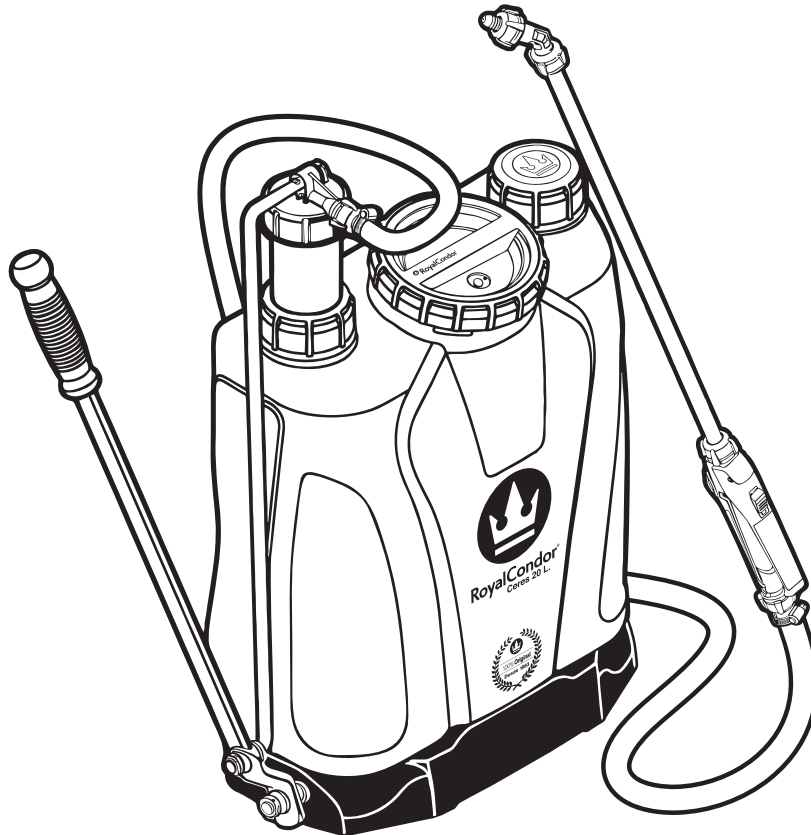


 **RoyalCondor**[®]
Ceres 20L.

USE AND CARE MANUAL
20-LITER INTERNAL PUMP SPRAYER



DEAR CUSTOMER:

 **RoyalCondor**[®]
Ceres 20L.

Consistent with our purpose to provide a sprayer model to address every preference, need, and budget, we introduce you to this sprayer model, **RoyalCondor[®] Ceres 20 Liters.**

The primary characteristic of this sprayer is its modern design and ease of cleaning and maintenance. It does not require any tools to assemble or disassemble, and it has few components, facilitating its care. Furthermore, it has the unique feature of allowing operation with either the left or right hand by simply shifting the pump to the other side.

SPRAYER APPLICATIONS AND USE

RoyalCondor[®] sprayers are designed to apply fertilizers, insecticides, fungicides, and herbicides.

It is appropriate for household use for multiple applications, including cleaning and applying detergents, vinegar, cleaning solutions, or non-toxic cleaning chemicals to carpets, floors, walls, and ceilings.

It can also be used to apply other products, such as wood preservatives, waxes, waterproofing chemicals, and diluted household bleach.

WARNING: *Do not use a sprayer that has been previously used with agrochemicals for household applications.*

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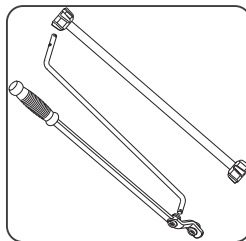
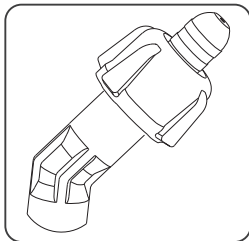
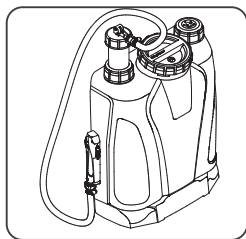
When you first unpack your **RoyalCondor®** sprayer, you should find the following components in the box:

A. Tank, diaphragm pump, frame, and trigger valve

B. Nozzles

C. Plastic wand, pump lever rod, assembly kits (U-pin and washer)

D. Use and Care Manual



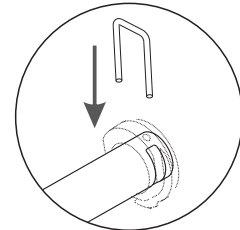
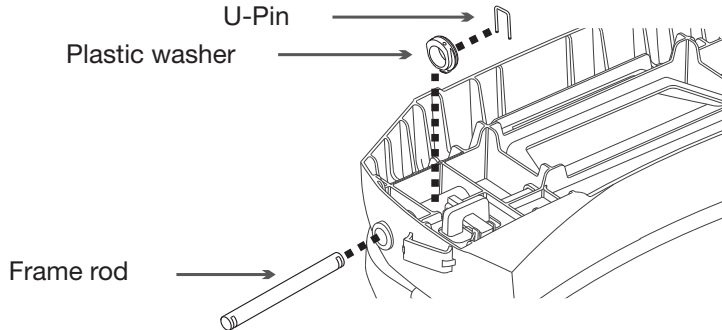
TECHNICAL SPECIFICATIONS |

GENERAL	Nominal capacity	20 Liters (5.3 gallons)	WAND	Flexible plastic
	Weight	4.6 Kg (10.1 pounds)		STRAPS
HOSE	Material	PVC	DESIGN	
	Working pressure	80 psi		
HYDRAULIC PUMP	Material	POM		
	Working pressure	50 psi		
	Presión máxima	150/180 psi		
STIRRER	Ensures the solution remains soluble.			

ASSEMBLING THE SPRAYER

Assembling the frame rod

1. Insert the frame rod into the lower frame hole, ensuring it is aligned with the pumping system. Lock the shaft with the plastic washer and secure it with the U-pin.

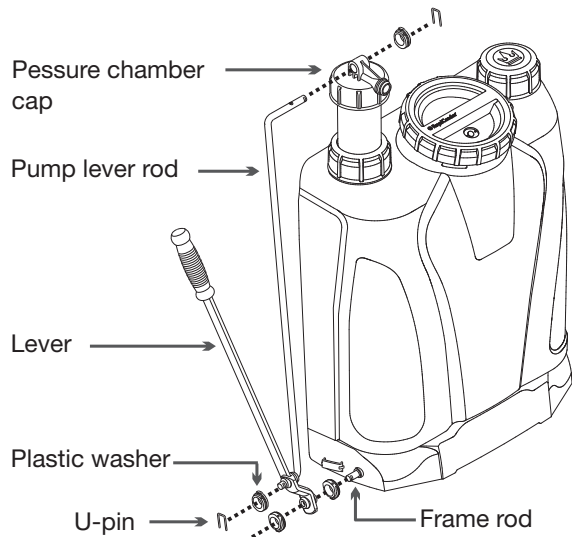


Important:

Make sure that the U-pin goes into the washer and fits snugly the slot in the frame rod.

Lever and pump lever rod assembly

1. Insert the plastic washer in the frame rod, then insert the lever onto the frame rod and secure it by inserting the plastic washer and u-pin.
2. Engage the pump lever rod in the second hole of the lever and secure it by inserting the plastic washer and the U-pin.
3. Attach the other end of the pump lever rod to the opening in the pressure chamber cap.
4. Insert the washer onto the pump lever rod and secure it with a U-pin.
5. Attempt to pump and verify the movement is smooth, without resistance.

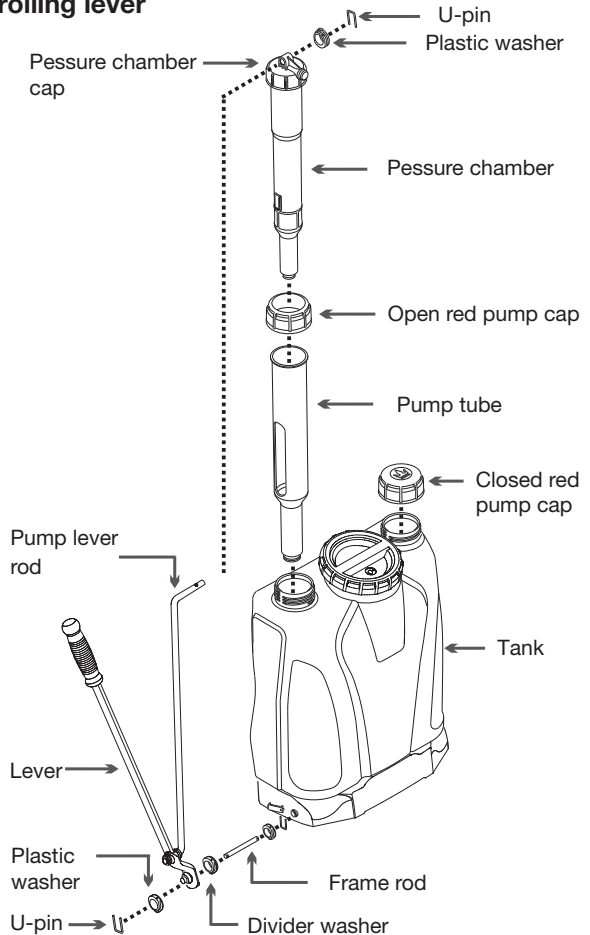


Pump assembly with right- or left-hand controlling lever

1. Remove the U-pin that secures the washer of the pump lever rod and the U-pin that secures the washer of the frame rod.
2. Disengage the pump lever rod from the pressure chamber cap.
3. Disengage the lever from the frame rod.
4. Remove the frame rod and place it on the right or left side as required.
5. Release the closed red pump cap from the container by turning it counterclockwise.
6. Remove the pressure chamber by pulling it out.
7. Release the open red pump cap from the container by turning it counterclockwise.
8. Remove the pump tube by pulling on it and install it on the side of your choice (left or right) by pressing on it.

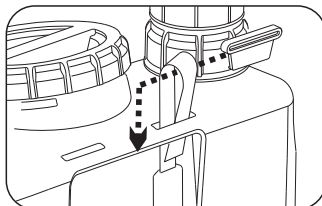
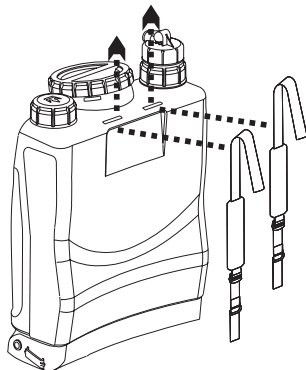
⚠ Make sure the hose outlet points toward the front of the sprayer (See image on page 10). ⚠

9. Install the open red pump cap on the container by turning it clockwise.
10. Install the pressure chamber over the pump tube by placing pressure on it.
11. Install the closed red pump cap on the container by turning it clockwise.
12. Attach the frame rod in the lever hole and the pump lever rod in the chamber cap hole.
13. Insert the washers onto the frame rod and pump lever rod and secure them with the U-pins.
14. Attempt to pump and verify the movement is smooth without resistance.

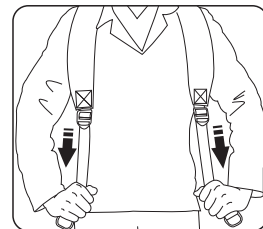
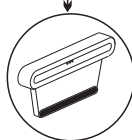


Installing the Shoulder Straps











1. Position the shoulder straps on the backplate of the sprayer and position the band so that the strap is facing the buckle.
2. Insert the band into the holes of the sprayer's backplate and insert the strap wedge.
3. Once the sprayer is on your back, adjust the straps by pulling down on the ends of the strap.



Important: The strap wedge has a ledge that attaches to the tank. This ledge must face toward the backplate of the sprayer.



NOZZLES

	 Drop Size	 Pressure (bar)	 Pressure (psi)	 Flow volume cc/min	 Type of spray	 Use
 Ref WR110015	Fine	2	29	490	Flat spray	Herbicide
	Very Fine	3	43	600		
	Very Fine	5	72	770		
 Ref RC-350A101X	Fine	2	29	420	Hollow cone 	Foliar
	Very Fine	3	43	520		
	Very Fine	5	72	650		

Calibrating the Sprayer

Verify that the nozzle is secure by measuring the output volume for one minute. It must not exceed 10% of the total output. Example: A 1000 cc/min nozzle should not exceed 1100 cc/min.

To calibrate the output flow, the use of a pressure regulating valve is recommended to ensure that the output pressure is consistent.

Remember to use only water when calibrating your equipment.

Calibrate your sprayer by following these simple steps:

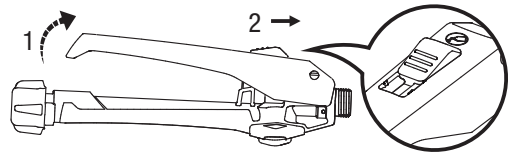
- Establish an area of 100m²; the recommended is 10m x 10m.
- Fill your sprayer tank close to the maximum capacity mark with water.
- Spray as usual in the specified area.
- After spraying, check the amount of water used.
- Multiply that figure by 100; the result is the amount of water that will be used per hectare (follow the label recommendations of the product that will be applied).

Contact us for information on more precise equipment calibration methods.

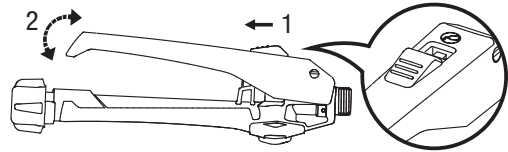
Three Possible Locking Positions

The trigger valve has a unique design which has three operating options:

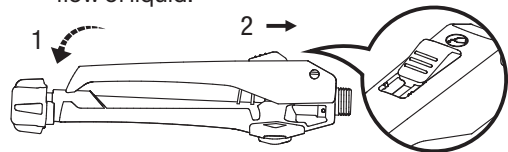
- 1** Locked with a safety lock, which prevents the passage of liquid and avoids accidental activation of the trigger valve.



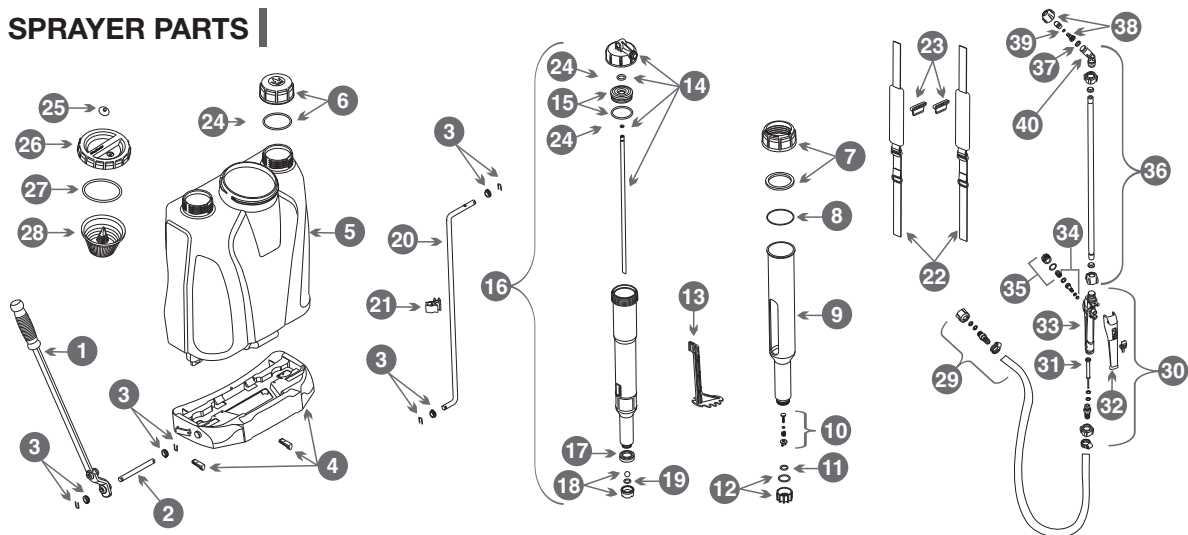
- 2** Freely activated, which allows or blocks liquid flow by depressing or releasing the trigger valve handle as required.



- 3** Open with a safety lock, which is ideal for long workdays because it can lock the trigger valve in place and allow the constant flow of liquid.



SPRAYER PARTS



N°	SPARE PART REFERENCE NUMBER	DESCRIPTION
1	RP FMG MNF RMI-809EX	Lever
2	PR FMG MNF RMI-605X	Frame rod
3	RP FMG MNF RMI-K608PLSX	U-pin and plastic washer kit
4	RP FMG MNF RMI-601EX	Plastic frame and wedge
5	PR FMG MNF RMI-200-20AM	20L Tank
6	PR FMG MNF RMI-203X	Closed red pump cap
7	PR FMG MNF RMI-104X	Open red pump cap and felt washer
9	PR FMG CMP RMI-107X	Pump tube gasket
9	PR FMG MNF RMI-1	Pump tube
10	RP FMG MNF RMI-K1X	Relief pump kit
11	PR FMG CMP RM-106VX	Viton O-ring Ref.113
12	PR FMG MNF RMI-102EX	Pump tube nut
13	PR FMG MNF RMI-508X	Stirrer
14	PR FMG MNF RMI-502EX	Pressure chamber cap set
15	PR FMG MNF RMI-504EX	Pressure chamber under-cap set
16	RP FMG MNF RMI-501EX	Assembled pressure chamber
17	RP FMG MNF RMI-413X	Pressure chamber ball and nut kit
18	RP FMG MNF RMI-K3X	Viton O-ring Ref.109
19	RP FMG MNF RMI-106VX	Pump lever rod
20	RP FMG MNF RMI-803X	Wand

N°	SPARE PART REFERENCE NUMBER	DESCRIPTION
21	RP FMG MNF RMI-845X	Lifting rod
22	RP FMG MNF RMI-700EX	Independent shoulder straps
23	RP FMG MNF RM-702X	Strap wedge
24	RP FMG MNF RM-K1X	Gasket kit
25	RP FMG MNF RC-206X	Ventilation diaphragm
26	RP FMG MNF RM-202X-02	Container cap
27	RP FMG MNF RM-202BX-01	Container cap gasket
28	RP FMG MNF RM-201X-01	Container filter
29	RP FMG MNF RMI-305X	Ceres assembled 20 L hose
30	RP FMG MNF RC-920LPNX	Trigger valve
31	RP FMG MNF RC-933LNX	Trigger valve filter
32	RP FMG MNF RC-930ENX	Trigger valve handle
33	RP FMG MNF RC-921LPNX	Valve body
34	RP FMG MNF RC-923ENX	Trigger valve assembled spindle
35	RP FMG MNF RC-922NX	Trigger valve plug
36	RP FMG MNF RCA-346ELFX	Plastic wand
37	RP FMG MNF RC-327X	O-ring nozzle holder
38	RP FMG MNF RC-350A151X	Bronze nozzle 700 cc/min 40 psi
39	RP FMG MNF RC-352X	Nozzle O-ring
40	RP FMG MNF RG-819LPEX	Plastic elbow

CLEANING AND MAINTENANCE |

Cleaning

1. Use proper personal protective equipment when handling agrochemicals.
2. Correctly dispose of all leftover chemicals/ product residue in the sprayer to prevent contamination of the environment and harm to domestic animals.
3. To clean the machine, fill the container with four or five liters of clean water and spray until empty. This should be done after each use or after a prolonged period of inactivity.
4. Rinse the sprayer filters thoroughly, including the nozzle, trigger valve, and container.
5. Wipe the outside of the sprayer with a moist cloth to eliminate pesticide residue.

Maintenance

Lubricate the following components with **RoyalCondor®** multipurpose oil before each workday:

1. Felt pump cap
2. Trigger valve spindle
3. Once a week, lubricate the piston gasket packing with grease
4. Once a week, lubricate the connection point between the lifting rod and the lever

SAFETY |

Most accidents occur when filling the sprayer or mixing the chemicals. The ensuing injuries may be severe, including blindness, burning, and scarring. When using chemicals, it is essential to follow the following safety precautions:

1. Carefully read the label and strictly follow all handling instructions. Use goggles if eye protection is required.
2. Use proper nozzles to prevent drift from harming other crops or the operator's health. Never apply pesticides against the wind.
3. If possible, use a sprayer exclusively for herbicides and another for other products to avoid a possible chemical reaction that releases toxic elements or, worse still, triggers an explosion.
4. Only mix compatible chemicals.
5. Do not leave waste. Collect used packaging and containers and dispose of them properly. Protecting nature and keeping it clean is our collective responsibility.
6. Do not apply flammable or highly corrosive products, acids, or products whose temperature exceeds 45°C.
7. When changing the pump position (right/left), make sure that the hose outlet faces away from the sprayer; the hose facing towards the straps may result in pesticide leaks and injury.



CORRECT



INCORRECT

TROUBLESHOOTING

PROBLEM	POSSIBLE CAUSE	SOLUTION
Sprayer discharges liquid but does not maintain the pressure.	Air leakage in the pressure chamber	Tighten the chamber cap as far as it will go
	The pressure chamber's cap is missing an O-ring	Check that the O-ring is in place or replace if worn
	The chamber straw is not positioned correctly	Check the straw is in the correct position and the straw's O-ring is in place
You can move the lever, but it quickly returns to its position on its own.	There is no seal between the ball and the O-ring section	Check the ball is in place or replace the O-ring if worn
There is no pressure in the machine.	The gasket piston is worn	Replace the gasket piston
	The ball in the pressure chamber is missing	Check that the part is in place
	The relief valve is missing	Check that the part is in place
The sprayer does not suction up all the liquid in the container.	The gasket piston is worn	Replace the gasket piston
Liquid is not coming out of the wand	The hose outlet or pressure valve is blocked	Check and clean all the outlet components, including the hose, valve filter, trigger valve, wand, nozzle retaining nut, and nozzle
The lever hangs loose when there is liquid in the pressure chamber	There is no seal between the tube and the relief valve	Check and adjust the relief valve or replace the O-ring if it is worn
Leak in the container cap	The cap is not screwed correctly	Unscrew the cap and screw it again correctly
Leak in the hose's extremities	The nuts' O-ring is worn or missing	Check that the O-ring is in place or replace if worn
Leak between the pump tube and the container	The gasket is warped or worn	Replace the gasket
The pressure in the sprayer is not constant	The valve spring is worn	Adjust the valve cap or replace the spring

THE OPERATOR:

When working with toxic chemicals, the operator and any bystanders may need to wear a properly fitted respirator approved by NIOSH/MSHA for the chemical being used. Consult the product label. Breathing toxic chemicals can cause serious or fatal injury.

HANDLING OF CHEMICALS:

1. Chemicals can be harmful to individuals, animals and the environment if improperly used. In addition, some chemicals that are caustic, corrosive or poisonous should not be used in your sprayer. Carefully read the labels on chemical containers prior to use. Chemicals are classified into categories of toxicity. Pesticides regulated by the EPA, for instance, use signal words to indicate the product's potential to make you sick. "Caution" appears on pesticides found to be least harmful to humans. "Warning" indicates a product that is more poisonous than those in the "Caution" group. Pesticides with the signal word "Danger" on the label are very poisonous or irritating. They should be used with extreme care. Finally, pesticides labeled "Danger – Poison" are for restricted use only and generally must be used under the supervision of a certified applicator. Similarly, the EPA rates herbicides with the signal words "Caution", "Warning" and "Danger." Each category will have unique handling characteristics. Familiarize yourself with the characteristics for the category you are using.

When working with toxic chemicals, the operator and any bystanders may need to wear a properly fitted respirator approved by NIOSH/MSHA for the

chemical being used. Consult the product label. Breathing toxic chemicals can cause serious or fatal injury.

2. Mix only compatible pesticides and/or herbicides. Wrong mixtures can produce toxic fumes. When handling chemicals and when spraying, make sure you are operating in accordance with local, state, and federal environmental protection rules and guidelines. Do not spray in windy conditions. To help protect the environment, use only the recommended dosage – do not overuse.
3. Do not eat, drink, or smoke while handling chemicals or while you are spraying. Never blow through nozzles, valves, pipes or any other component by mouth. Always handle chemicals in a well-ventilated area while wearing appropriate protective clothing and safety equipment. Do not store or transport chemicals with food or medicines, and never reuse a chemical container for any other purpose. Do not transfer spray materials to other containers, especially food and/or drink containers.
4. In case of accidental contact or ingestion of chemicals or in case of contamination of clothing, stop work and immediately consult the chemical manufacturer's instructions. If in doubt as to what to do, consult a poison control center or doctor without delay. Have the product's label available to read to or show the persons you consult. Clean all chemical spills immediately. Dispose of any residue in accordance with state or federal laws and regulations.
5. Keep chemicals out of reach of children, other unauthorized people or animals. When not in use, store chemicals in a safe place. Follow the manufacturer's recommendations for proper storage.

THE USE OF THE BACKPACK SPRAYER: |

1. Inhalation of certain chemicals can cause susceptible persons to have an allergic or asthmatic reaction. Substantial or repeated inhalation of certain chemicals may cause respiratory disease, cancer, birth defects, or other reproductive harm. Control the chemical spray at the source where possible.
3. After the use of some chemicals, especially agricultural pesticides, a notice must be posted on the treated area that a "Restricted Entry Interval" (REI) is in effect. See the product's label and any applicable governmental regulations.

Use good work practices, such as operating the unit so that the wind or operating process does not blow the spray back on the operator. Follow the recommendations of EPA/OSHA/NIOSH and occupational and trade associations with respect to proper usage. When the inhalation of the chemical being sprayed cannot be avoided, the operator and any bystanders may need to wear a respirator approved by NIOSH/MSHA for the type of chemical encountered. Consult the label of the chemical product being used.

2. If you are unfamiliar with the risks associated with the particular chemical at issue, review the product label and/or material safety data sheet for that substance and/or consult the material manufacturer/supplier. You may also consult your employer, governmental agencies such as the EPA, OSHA and NIOSH and other sources on hazardous materials. The state of California and some other authorities, for instance, have published lists of substances known to cause cancer, reproductive toxicity, etc.

WARRANTY |

Period: Two (2) years from the date of purchase.

Coverage: Within the territory and period stipulated in this document.

- **RoyalCondor**[®] warrants its sprayer is free from defects in workmanship and materials.
- **RoyalCondor**[®] will correct any defects in workmanship and materials free of charge during the warranty period by replacing the defective part, not the entire unit.
- This warranty is offered under everyday use and maintenance conditions, subject to a specified period and specific exclusions.

Exclusions and limitations:

- The warranty does not cover the gaskets and O-rings of the sprayers.
- It does not cover missing parts.
- It does not cover incidental damage, loss, or breakdown resulting from normal wear or tear, misuse, modifications or changes to original components, neglect, improper maintenance or adjustments, or lubricants or spare parts that fail to comply with the manufacturer's specifications.
- **RoyalCondor**[®] reserves the right to change the assignment or specifications of any use or part without the need to make said changes to those already manufactured.

Buyer's liability:

- The user must demonstrate reasonable care in using, maintaining, and storing the sprayer.
- To obtain warranty service for any covered defect, the purchaser must deliver the product to the distributor where it was purchased, along with the purchase invoice.

"The use of original spare parts increases the useful life of your sprayer."

Ownership and Warranty Card



Invoice No: _____ Date of Purchase: _____

Point of Sale: _____

Name of Owner: _____

Address: _____

Municipality or City: _____

Department: _____

Personal ID Number: _____

Telephone: _____

Unit Serial Number: _____



WARNING

This product contains chemicals known to the State of California to cause cancer, birth defects or other reproductive harm.


0458-408-8621-A
englisch / spanisch USA



WARRANTY No.:



PROGEN S.A. Producciones Generales S.A.
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At **RoyalCondor**[®], we love our planet and have printed this Manual on  **Smurfit Kappa** eco-friendly paper.



FSC | Responsible forest management certification