

PMRA Approved Label  
2022-1681  
2023-03-30

# LALGUARD M52 GR

## For Outdoor and Greenhouse Uses

BIOLOGICAL INSECTICIDE  
LIVE ORGANISM

GRANULAR  
COMMERCIAL

**KEEP OUT OF REACH OF CHILDREN  
READ THE LABEL BEFORE USING**

**ACTIVE INGREDIENT:**

*Metarhizium brunneum* strain F52  
Contains a minimum of  $6 \times 10^8$  CFU/g

REGISTRATION NO: 29147 PEST CONTROL PRODUCTS ACT

WARNING - EYE AND SKIN IRRITANT  
POTENTIAL SENSITIZER

**Net Contents \_\_\_\_\_**

Danstar Ferment AG  
Poststrasse 30  
Zug, Switzerland CH-6300

Canadian agent:  
Lallemand Inc./LALLEMAND PLANT CARE  
59 Industrial Park Crescent, Unit 1  
Sault Ste. Marie, ON P6B 5P3  
Phone: 1-888-236-7378

Date of Manufacture: dd-mm-yyyy  
Batch Code/Expiry Date: XXXX/dd-mm-year

**PRECAUTIONS:** KEEP OUT OF REACH OF CHILDREN.

Causes eye and skin irritation. DO NOT get in eyes or on skin. May cause sensitization. Avoid contact with clothing. Avoid breathing dust.

Wear a long-sleeved shirt and long pants, protective eyewear (goggles), waterproof gloves, socks and shoes, and a NIOSH approved particulate filtering facepiece respirator with any N, R or P filter when handling, mixing/loading or applying the product and during all clean-up/repair activities. Wash thoroughly with soap and water after handling. Remove contaminated clothing and wash before reuse. Follow manufacturer's instructions for cleaning/maintaining personal protective equipment (PPE). If no such instructions for washables, use detergent and hot water. Keep and wash PPE separately from other laundry.

**ENVIRONMENTAL PRECAUTIONS:** To reduce runoff from treated areas into aquatic habitats, avoid application to areas with a moderate to steep slope, compacted soil or clay. Avoid application when heavy rain is forecast. Contamination of aquatic areas as a result of runoff may be reduced by including a vegetative filter strip between the treated area and the edge of the water body.

**FIRST AID:**

**IF SWALLOWED:** Call a poison control centre or doctor immediately for treatment advice. Have person sip a glass of water if able to swallow. Do not induce vomiting unless told to do so by a poison control centre or doctor. Do not give anything by mouth to an unconscious person.

**IF ON SKIN OR CLOTHING:** Take off contaminated clothing. Rinse skin immediately with plenty of water for 15 - 20 minutes. Call a poison control centre or doctor for treatment advice.

**IF INHALED:** Move person to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible. Call a poison control centre or doctor for treatment advice.

**IF IN EYES:** Hold eye open and rinse slowly and gently with water for 15-20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. Call a poison control centre or doctor for treatment advice.

Take container, label or product name and Pest Control Product Registration Number with you when seeking medical attention.

**TOXICOLOGICAL INFORMATION:** Treat symptomatically.

**DIRECTIONS FOR USE**

**GENERAL:** LALGUARD M52 GR is composed of spores of the insect pathogenic fungus *Metarhizium brunneum* Strain F52 on a grain matrix. Once the product is incorporated into the growing medium, insects that come into contact with the fungus will become infected. The spores of *Metarhizium brunneum* attach to the surface of the insect, germinate and begin to grow. It will penetrate the exoskeleton of the insect and grow very rapidly inside the insect, causing the insect to die. Under ideal conditions, it usually takes 3 to 5 days, once the insect is exposed for death to occur. As insects are infected, other insects that come into contact with them may also become infected. Depending on cultural practices and environmental conditions, control may last up to nine months.

**USE RESTRICTIONS:** DO NOT contaminate irrigation or drinking water supplies or aquatic habitats by cleaning of equipment or disposal of wash water.

DO NOT apply by aerial application equipment.

**DO NOT** apply greenhouse processing water containing this product to field crops (food and feed).

DO NOT allow effluent or runoff from greenhouses containing this product to enter lakes, streams, ponds or other waters.

DO NOT apply by any type of chemigation.

**RESTRICTED-ENTRY INTERVAL:** Entry to the treated area is not restricted following application.

**PRE-HARVEST INTERVAL:** LALGUARD M52 GR can be used up to and including the day of harvest. PHI=0 days.

**APPLICATION INSTRUCTIONS:** Apply LALGUARD M52 GR prior to or during planting by thoroughly mixing the product into the growing medium, ensuring even distribution. Soil should be moist at the time of application and maintained in a moist condition after application for best performance.

### **Applications to Growing Media for Container Grown Crops:**

Apply 500 g to 1.5 kg/m<sup>3</sup> of moist soil medium, using the higher application rate when pest pressure is expected to be high. For thrips apply at 1.5 kg/m<sup>3</sup>. Uniformly incorporate the LALGUARD M52 GR throughout the growing medium.

Do not mix fungicides in growth medium containing LALGUARD M52 GR. Keep the plants above 16°C and maintain good drainage. LALGUARD M52 GR is

grown on cereal grains that will decompose in the growing media. Pests likely to be attracted by grains, such as rodents, must be controlled prior to use of this product.

#### **INSECTS CONTROLLED:**

- Black Vine Weevil (all growth stages)
- Strawberry Root Weevil (all growth stages)
- May reduce number of Thrips

#### **SITES FOR USE:**

Container-grown ornamentals, including flowering and foliage plants, shrubs, and shade and forest tree seedlings.

This product may be used in container-grown crops in greenhouses and in outdoor nurseries.

**STORAGE:** Keep in original container during storage. Store product in cool, dry, well-ventilated place away from food, drink, seed, feed, fertilizer or other pesticides. Keep away from direct sunlight, fire or open flame, or other source of heat.

LALGUARD M52 GR consists of living microbes. Store closed product in a cool dry place at < 23°C. Unopened product has a viable shelf-life of 12 months from date of manufacture. Exposing product to temperatures up to 35°C, will reduce the shelf-life to 1 month. Do not freeze.

#### **DISPOSAL:**

1. Triple- or pressure rinse the empty container. Add the rinsings to the treatment site.
2. Follow provincial instruction for any required additional cleaning of the container prior to its disposal.
3. Make the empty container unsuitable for further use.
4. Dispose of the container in accordance with provincial requirements.
5. For information on disposal of unused, unwanted product, contact the manufacturer or the provincial regulatory agency. Contact the manufacturer and the provincial regulatory agency in case of a spill, and for clean-up of spills.

**NOTICE TO USER:** This pest control product is to be used only in accordance with the directions on the label. It is an offence under the *Pest Control Products Act* to use this product in a way that is inconsistent with the directions on the label.