GROUP INSECTICIDE

DOC ID 520152

# ImiGold 2F

# Turf & Ornamental Insecticide

For insect control (both foliar and systemic) in turfgrass (including sod farms), ornamentals, fruit and nut trees, and interior plantscapes.

Not for Sod Farm use in Arizona.

#### **ACTIVE INGREDIENT**

Imidacloprid – 1-(6-Chloro-3-pyridinyl)methyl-N-nitro-	
2-imidazolidinimine	21.4%
OTHER INGREDIENTS	78.6%
TOTAL	100.0%

# **KEEP OUT OF REACH OF CHILDREN CAUTION**

#### **FIRST AID** If on skin • Take off contaminated clothing. or clothing · Rinse skin immediately with plenty of water for 15-20 minutes. Call a poison control center or doctor for treatment advice. If swallowed · Call a poison control center 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 the poison control center or doctor. · Do not give anything by mouth to an unconscious person. Hold eye open and rinse slowly and gently If in eyes with water for 15-20 minutes. · Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. · Call a poison control center or doctor for

Have the product container or label with you when calling a poison control center or doctor, or going for treatment. Contact the Rocky Mountain Poison Control Center at 1-866-673-6671 for emergency medical treatment information.

treatment advice.

NOTE TO PHYSICIAN: No specific antidote is available. Treat symptomatically.

FOR CHEMICAL EMERGENCY: Spill, leak, fire, exposure, or accident, call CHEMTREC at 1-800-424-9300

EPA Reg. No. 70506-150 EPA Est. No. 61842-CA-001

Batch/Lot #

**Net Contents: 20 fluid ounces** 



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## PRECAUTIONARY STATEMENTS

### HAZARDS TO HUMANS AND DOMESTIC ANIMALS "RESTRICTED USE" CAUTION

Classified for in New York State under 6NYCRR Part 326

Harmful if swallowed or absorbed through skin or if inhaled. Avoid contact with skin, eyes, or clothing. Avoid breathing spray mist.

#### **Personal Protective Equipment (PPE):**

**WPS Uses:** Applicators and other handlers (mixers and loaders) who handle this product for any use covered by the Worker Protection Standard (40 CFR part 170) - in general, agricultural plant uses such as sod farms, must wear:

- · Long-sleeved shirts and long pants
- Chemical-resistant gloves made of any waterproof material such as barrier laminate, butyl rubber, nitrile rubber, neoprene rubber, natural rubber, polyethylene, polyvinylchloride (PVC) or viton. If you want more options, follow the instructions for category A on an EPA chemical-resistance category selection chart.
- · Shoes plus socks.

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.

Non WPS Uses: Applicators and other handlers who handle this product for any use NOT covered by the Worker Protection Standard (40 CFR part 170) must wear:

- Shirt and pants
- Gloves
- Shoes plus socks

#### **Engineering Controls Statements:**

When handlers use closed systems, enclosed cabs, or aircraft in a manner that meets the requirements listed in the Worker Protection Standard (WPS) for agricultural pesticides [40 CFR 170.240(d)(4-6)], the handler PPE requirements may be reduced or modified as specified in the WPS.

Important: when reduced PPE is worn because a closed system is being used, handlers must be provided all PPE specified above for "Applicators and Other Handlers" and have such PPE immediately available for use in an emergency, such as a spill or equipment breakdown.

#### USER SAFETY RECOMMENDATIONS

- · Wash hands before eating, drinking, chewing gum, using tobacco or using the toilet.
- Remove clothing/PPE immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing.
- · Remove PPE immediately after handling. Wash the outside of gloves before removing. As soon as possible, wash thoroughly and change into clean clothing.

#### **ENVIRONMENTAL HAZARDS**

This product is highly toxic to aquatic invertebrates. Do not apply directly to water, areas where surface water is present or to intertidal areas below the mean high water mark. Do not contaminate water when disposing of equipment washwaters.

This product is highly toxic to bees exposed to direct treatment or residues on blooming crops or weeds. Do not apply this product or allow it to drift to blooming crops or weeds if bees are visiting the treatment area.

This chemical demonstrates the properties and characteristics associated with chemicals detected in ground water. The use of this chemical in areas where soils are permeable, particularly where the water table is shallow, may result in groundwater contamination.

Apply this product only as specified on this label. Extreme care must be taken to avoid runoff. Apply only to soil or other fill substrate that will accept the solution at the specified rate. Do not treat soil that is water-saturated or frozen or in any conditions where runoff or movement from the treatment area (site) is likely to occur.

#### **DIRECTIONS FOR USE**

It is a violation of Federal Law to use this product in a manner inconsistent with its labeling.

Do not apply this product in a way that will contact workers or other persons, either directly or through drift. Only protected handlers may be in the area during application. For any requirements specific to your State or Tribe, consult the agency responsible for pesticide regulation.

#### **AGRICULTURAL USE REQUIREMENTS**

Use this product only in accordance with its labeling and with the Worker Protection Standard, 40 CFR part 170. This Standard contains requirements for the protection of agricultural workers on farms, forests, nurseries and greenhouses, and handlers of agricultural pesticides. It contains requirements for training, decontamination, notification, and emergency assistance. It also contains specific instructions and exceptions pertaining to the statements on this label about personal protective equipment (PPE) and restricted-entry interval. The requirements in this box only apply to uses of this product that are covered by the Worker Protection Standard.

Do not enter or allow worker entry into treatment areas during the restricted entry interval (REI) of 12 hours. Earlier entry by exception.

Exception: If the product is soil-injected or soil-incorporated, the Worker Protection Standard, under certain circumstances, allows workers to enter the treated area if there will be no contact with anything that has been treated.

PPE required for early entry to treated areas that is permitted under the Worker Protection Standard and that involves contact with anything that has been treated, such as plants, soil, or water, is:

- Coveralls
- Chemical-resistant gloves made of any waterproof material such as, barrier laminate, butyl rubber, nitrile rubber, neoprene rubber, natural rubber, polyethylene, polyvinylchloride (PVC) or viton. If you want more options, follow the instructions for category A on an EPA chemical-resistance category selection chart.
- Shoes plus socks

#### **NON-AGRICULTURAL USE REQUIREMENTS**

The requirements in this box apply to uses of this product that are NOT within the scope of the Worker Protection Standard for agricultural pesticides (40 CFR part 170). The WPS applies when this product is used to produce agricultural plants on farms, forests, nurseries, or greenhouses.

Keep children and pets off treated area until dry.

#### STORAGE AND DISPOSAL

Do not contaminate water, food, or feed by storage and disposal.

Pesticide Storage: Store in a cool, dry area and in such a manner as to prevent cross contamination with other pesticides, fertilizers, food, and feed. Store in original container and out of the reach of children, preferably in a locked storage area. Handle and open container in a manner as to prevent spillage. If the container is leaking or material is spilled for any reason or cause, absorb with sand or other inert material and dispose of absorbent in accordance with the Pesticide Disposal instructions listed below. Refer to Precautionary Statements on label for hazards associated with the handling of this material. In spill or leak incidents, keep unauthorized people away.

**Pesticide Disposal:** Wastes resulting from the use of this product must be disposed of on site or at an approved waste disposal facility.

**Container Handling:** Nonrefillable container. Do not reuse or refill this container.

Clean container promptly after emptying. Triple rinse as follows: Empty the remaining contents into application equipment or a mix tank and drain for 10 seconds after the flow begins to drip. Fill the container 1/4 full with water and recap. Shake for 10 seconds. Pour rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Drain for 10 seconds after the flow begins to drip. Repeat this procedure two more times. Then offer for recycling if available or puncture and dispose of in a sanitary landfill, or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of the smoke.

#### TURFGRASS/GRASSY AREA APPLICATIONS

Do not apply more than a total of 1.6 pints (0.4 lb. a.i.) per acre per year.

Apply ImiGold 2 F Turf & Ornamental Insecticide to the following sites, to control/suppress the pests listed in the chart below.

Home lawns

Business and office complexes

Shopping complexes

Multi-family residential complexes

Golf courses

Airports

Cemeteries

Parks

Playgrounds

Athletic fields

Sod farms \*

#### **PESTS CONTROLLED**

Northern and Southern masked chafers

Asiatic garden beetle

European chafer

Green June beetle

May or June beetle

Japanese beetle

Oriental beetle

Billbugs

Annual bluegrass weevil

Annual bluegrass ataenius

European crane fly

Mole crickets

#### **PESTS SUPPRESSED**

Cutworms

Chinchbugs

\* NOTE: Not for Sod Farm use in Arizona.

Due to the residual activity of the active ingredient, applications of ImiGold 2 F Turf & Ornamental Insecticide may be made before target pests lay their eggs. For best control, apply before the eggs hatch. All applications should be followed by rainfall or irrigation to move the active ingredient through the thatch.

When infested turfgrass areas are waterlogged, or soil beneath turf is saturated with water, avoid making applications because it is difficult to obtain thorough and consistent distribution of the product. For best results, ensure that rainfall or irrigation after application will vertically penetrate the soil, allowing the active ingredient to be carried into the zone where the pests are found.

#### **Application**

Apply ImiGold 2 F Turf & Ornamental Insecticide in sufficient water to provide adequate distribution in the treated area. Use a low pressure setting, and apply a uniform coarse droplet spray. Calibrate equipment regularly to ensure that the product is being distributed properly.

PESTS	RATE IMIGOLD 2 F	INSTRUCTIONS
Larvae of:	1.25 to 1.6 pt./A	For best control, apply before egg hatch.
Annual bluegrass weevil Asiatic garden beetle Billbug	or 0.46 to 0.6 fl. oz. (14 to 17 mL)	To ensure that the active ingredient moves into the turf, irrigation or rainfall should occur within 24 hours of application. Avoid mowing until after sufficient irrigation or rainfall has occurred.
Black turfgrass ataenius Chinchbugs (suppression)	per 1000 square ft.	For chinch bugs (suppression), apply the maximum rate before the first instar nymphs hatch.
Cutworms (suppression) European crane fly European chafer Green June beetle		For mole crickets, apply before or during the peak egg hatch period. For adults or large nymphs that are actively tunneling, combine ImiGold 2 F Turf & Ornamental Insecticide with a curative insecticide.
Japanese beetle Mole crickets Northern masked chafer Oriental beetle Phyllophaga spp Southern masked chafer		Do not apply more than 1.6 pt. (0.4 lb. a.i.) per acre per year.

#### ORNAMENTAL APPLICATIONS

For use on ornamental plants in commercial and residential landscapes and interior plantscapes.

For outdoor ornamentals, do not apply more than a total of 1.6 pt. (0.4 lb. a.i.) per acre per year.

Because ImiGold 2 F Turf & Ornamental Insecticide is a systemic insecticide that is transported within the plant system from the roots to the upper foliage, it must be applied into a growing area of the plant so that the active ingredient can be absorbed. To promote the uptake of active ingredient, soluble nitrogen type fertilizers can be added to the spray solution.

Applications can be made by foliar or soil applications, including soil injection, drenches, and broadcast sprays. Foliar applications provide locally systemic activity against insect pests.

When the product is applied to woody plants using soil application, the systemic translocation of the active ingredient will be slower, and can take as much as 60 days and sometimes longer, depending on the species and size of the plant.

#### Resistance

Some species of insects can develop resistance to neonicotinoid class insecticides such as imidacloprid, following repeated use. Use this product with resistance management strategies established for the use area.

#### Use for Ant Management

Use ImiGold 2 F Turf & Ornamental Insecticide to control ants by removing honeydew as their food source. ImiGold 2 F Turf & Ornamental Insecticide will control the aphids, scale insects, mealybugs and other sucking pests on ornamentals. For greater ant control, supplement foliar application with residual sprays, baits, or other ant control tactics.

#### **Application**

ImiGold 2 F Turf & Ornamental Insecticide may be used in many types of application equipment. It mixes well with water. For better coverage on hard to wet foliage on plants such as holly, ivy, or pine, add a commercial spreader/sticker.

ImiGold 2 F Turf & Ornamental Insecticide is compatible with many fungicides, miticides, liquid fertilizers, and insecticides. If the applicator does not have experience with a particular tank mix, use a clear jar to test compatibility using the proportions of the proposed tank mixture.

Media with 30% or higher bark content may confer a shorter period of protection when treated with ImiGold 2 F Turf & Ornamental Insecticide.

Do not apply through any irrigation system.

PLANTS	PESTS	RATE IMIGOLD 2 F	INSTRUCTIONS
Trees Shrubs Evergreens Flowers Foliage plants Groundcovers Interior Plantscapes	Adelgids Aphids Japanese beetles Lace bugs Leaf beetles (including elm & viburnum leaf beetles) Leafhoppers (including glassy-winged sharpshooter) Mealybugs Psyliads Sawfly larvae Thrips (suppr.) Whiteflies White grub larvae (Japanese beetle, chafers, Phyllaphaga spp, Asiatic garden beetle, Oriental beetle)	1.5 fl. oz. (45 mL) per 100 gallons of water	Before pest populations become established, make foliar applications. Apply as needed.  Mix the required amount of product in enough water for uniform and accurate coverage. Do not use less than 2 gallons of water per 1000 sq. ft.  It may be necessary to irrigate thoroughly to incorporate ImiGold 2 F Turf & Ornamental Insecticide into the upper soil zone.  To control white grub larvae, apply 0.46 to 0.6 fl. oz. (14 to 17 mL) per 1000 sq. ft.

Only for this use in and around industrial and commercial buildings and residential areas, and interiorscapes, and state, national, and private wooded and forested areas.

ORNAMENTAL PLANTS	PESTS	RATE IMIGOLD 2 F	INSTRUCTIONS
Trees Shrubs Flowers Groundcovers	Adelgids Aphids Armored scales (suppression) Black vine weevil Elm and viburnum Eucalyptus longhorned borer Flatheaded borers (incl. bronze birch and alder borer) Japanese beetles Lace bugs Leafminers Leaf beetles (incl. Pine tip moth larvae) Leafhoppers (incl. glassy-winged sharpshooter) Mealybugs Psyllids Royal palm bugs Sawfly larvae Soft scales Thrips (suppression) larvae White grub larvae Whiteflies	TREES* 0.1 to 0.2 fl. oz. (3 to 6 mL) per inch trunk diameter (D.B.H.) SHRUBS** 0.1 to 0.2 fl. oz. (3 to 6 mL) per foot of shrub height FLOWERS & GROUND COVERS 0.46 to 0.6 fl. oz. (14 to 17 mL) per 1000 sq. ft.	TREES, SOIL INJECTION: for a grid system, apply in a grid pattern on 2.5 centers within the tree's drip line. For a circle system, apply in evenly spaced holes approximately 1-3 ft. apart in a circle within the tree's drip line. More circles may be needed for larger trees. For a basal system, apply in evenly spaced holes no more than 6 to 12 inches out from the tree's base.  TREES, SOIL DRENCH: Apply in at least 10 gallons water per 1000 sq. ft. as a drench around the base of the tree, directed to the root zone. Remove any barrier that may prevent the solution from reaching the root zone.  SHRUBS, SOIL INJECTION: Apply to individual plants using dosage indicated.  SHRUBS, SOIL DRENCH: Apply as a uniform drench around the base of the shrub, in at least 10 gallons water per 1000 sq. ft. Remove any barrier that may prevent the solution from reaching the root zone.  FLOWERS AND GROUNDCOVERS: Apply as a broadcast treatment, incorporating into the soil before planting. Application can also be made after the plants are established; in this case best control is achieved if plants are irrigated after application.

<sup>\*</sup> Notes and restrictions for TREES: Use enough water so that an equal amount of solution may be injected in each hole. Use low pressure and enough solution to ensure thorough distribution. Keep soil moist for 7-10 days. Use at least 4 holes per tree. No soil injection applications are allowed in Nassau or Suffolk Counties of New York. If trees are already heavily infested with borers, application may not save the tree.

<sup>\*\*</sup> Notes and restrictions for SHRUBS: Use enough water so that an equal amount of solution may be injected in each hole. Use low pressure and enough solution to ensure thorough distribution. Use at least 4 holes per shrub. No soil injection applications are allowed in Nassau or Suffolk Counties of New York.

#### FOR USE ON POME FRUITS IN AND AROUND RESIDENTIAL AREAS ONLY

(Apple, Crabapple, Loquat, Mayhaw, Pear, Pear (oriental), Quince)

PESTS	RATE IMIGOLD 2 F	INSTRUCTIONS
Aphids (except Wooly apple aphid) Leafhoppers (incl. glassy-winged sharpshooter) Leafminer Mealybugs (not for use on this pest in pears in California) San Jose Scale	1.5 fl. oz. (45 mL) per 100 gallons or 6.0 fl. oz./Acre Note: the amount of product per acre will vary according to tree size and volume of foliage. This rate is based on a standard 400 gallons dilute solution per acre for large trees.	Apply at the recommended rate as needed once petal fall is complete.  Do not apply more than 6.0 fl. oz. per acre in one single application. Do not make more than 5 applications.  Do not apply more often than every 10 days.  Preharvest interval: 7 days.  Rosy apple aphid: apply before the pest begins leafrolling.  First generation leafminers: apply as soon as petal fall is complete. For best control, apply as early as possible.  Second and later generation leafminers: apply early in the adult flight to control eggs and early instar larvae. If necessary under conditions of severe pressure or overlapping generations, make a second application 10 days later. Applying only once may result only in suppression. This product will not control late stage larvae.  San Jose Scale: make application at the crawler stage. Treat each generation.  Leafhoppers, late season control: apply when most leafhoppers are nymphs.  Mealybug: for best control, good coverage of trunk, scaffolding limbs, or other resting sites is essential.

#### FOR USE ON PECANS IN AND AROUND RESIDENTIAL AREAS ONLY

Note: use on pecans is not allowed in California unless specific supplemental labeling exists

PESTS	RATE IMIGOLD 2 F	INSTRUCTIONS
Yellow pecan aphid Black margined aphid Pecan leaf phyloxera Pecan spittlebug Pecan stem phylloxera	1.5 fl. oz. (45 mL) per 100 gallons or 6.0 fl. oz./Acre Note: the amount of product per acre will vary according to tree size and volume of foliage. This rate is based on a standard 400 gallons dilute solution per acre for large trees.	Make foliar applications before pest population becomes severe. For optimum control, 2 applications at 10- to 14-day intervals may be needed. Scout and retreat if necessary.  Treat foliage to ensure thorough, uniform coverage. An organosilicone-based spray adjuvant may be added at a rate not exceeding the manufacturer's recommendation, to improve coverage. Do not apply more than 18.0 fl. oz. ImiGold 2 F Turf & Ornamental Insecticide per acre per year.  Do not apply more than 3 times per year.  Do not apply more often than every 10 days.

# FOR USE ON GRAPES IN AND AROUND INDUSTRIAL AND COMMERCIAL BUILDINGS AND RESIDENTIAL AREAS

PESTS	RATE IMIGOLD 2 F	INSTRUCTIONS
Leafhoppers, incl. glassy-winged sharpshooter Mealybugs	1.5 fl. oz. (45 mL) per 100 gallons or 3.0 fl. oz./Acre (90 mL/A)	Apply as a foliar spray using 200 gallons water per acre.  Do not apply more than 6.0 fl. oz. ImiGold 2 F Turf & Ornamental Insecticide per acre per year.  Do not apply more often than every 14 days.  ImiGold 2 F Turf & Ornamental Insecticide may be applied up to and including the day of harvest.

#### **RESTRICTIONS**

Do not graze treated areas or use clippings from treated areas for feed or forage.

Avoid runoff or puddling of irrigation water following application.

Keep children and pets off treated area until dry.

Avoid application of ImiGold 2 F Turf & Ornamental Insecticide to areas which are waterlogged or saturated, which will not allow penetration into the root zone of the plant.

Do not apply more than 1.6 pt. (0.4 lb. a.i.) per acre per year.

Treated areas may be replanted with any crop specified on an imidacloprid label, or with any crop for which a tolerance exists for the active ingredient.

For crops not listed on an imidacloprid label, or for crops for which no tolerances for the active ingredient have been established, a 12-month plantback interval should be observed.

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# IMPORTANT INFORMATION READ BEFORE USING PRODUCT

#### CONDITIONS OF SALE AND LIMITATION OF WARRANTY AND LIABILITY

**NOTICE:** Read the entire Directions for Use and Conditions of Sale and Limitation of Warranty and Liability before buying or using this product. If the terms are not acceptable, return the product at once, unopened, and the purchase price will be refunded.

The Directions for Use of this product reflect the opinion of experts based on field use and tests, and must be followed carefully. It is impossible to eliminate all risks associated with the use of this product. Crop injury, ineffectiveness or other unintended consequences may result because of such factors as manner of use or application, weather or crop conditions, presence of other materials or other influencing factors in the use of the product, which are beyond the control of United Phosphorus, Inc. or Seller. Handling, storage, and use of the product by Buyer or User are beyond the control of United Phosphorus, Inc. and Seller. All such risks shall be assumed by Buyer and User, and Buyer and User agree to hold United Phosphorus, Inc. and Seller harmless for any claims relating to such factors.

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