

BIFEN 7.9F SELECT™

INSECTICIDE
INTENDED FOR USE AND STORAGE BY COMMERCIAL APPLICATORS.

Controls listed insect pests and mites indoors and in interiorscapes; outdoors on non-commercial ornamentals and lawns in landscaped areas around residential, institutional, public, commercial, and industrial buildings, parks, recreational areas, and athletic fields.

Active Ingredient:

Bifenthrin*	7.90%
OTHER INGREDIENTS	<u>92.10%</u>
TOTAL	100.00%

Contains 2/3 pound active ingredient per gallon.

*Cis isomers 97% minimum, trans isomers 3% maximum.

**KEEP OUT OF REACH OF CHILDREN
CAUTION**

See other panels for additional precautionary information.

NOT FOR USE IN NEW YORK STATE WITHOUT THE PRODUCT BULLETIN FOR BIFEN 7.9F SELECT.

FIRST AID

IF SWALLOWED:	<ul style="list-style-type: none"> • 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.
IF ON SKIN OR CLOTHING:	<ul style="list-style-type: none"> • Take off contaminated clothing. • Rinse skin immediately with plenty of water for 15-20 minutes. • Call a poison control center or doctor for treatment advice.
IF INHALED:	<ul style="list-style-type: none"> • 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 center or doctor for further treatment advice.
IF IN EYES:	<ul style="list-style-type: none"> • Hold eye open and rinse slowly and gently with water 15-20 minutes. • Remove contact lenses, if present, after the first 5 minutes, then continuing rinsing eye. • Call a poison control center or doctor for treatment advice.
<p>NOTE TO PHYSICIAN: This product is a pyrethroid. If large amounts have been ingested, the stomach and intestine should be evacuated. Treatment is symptomatic and supportive. Digestible fats, oils, or alcohol may increase absorption and so should be avoided.</p>	
<p>Have the product container or label with you when calling a poison control center or doctor, or going for treatment. For emergency information concerning this product, call the poison control center at 1-800-222-1222.</p>	

EPA Reg. No. 89442-23

BIFEN 7.9F SELECT™

INSECTICIDE

PRECAUTIONARY STATEMENTS HAZARDS TO HUMANS AND DOMESTIC ANIMALS

CAUTION - Harmful if swallowed, inhaled or absorbed through skin. Causes moderate eye irritation. Avoid breathing vapor or spray mist. Avoid contact with skin, eyes, or clothing.

PERSONAL PROTECTION EQUIPMENT (PPE)

Pesticide handlers (mixers, loaders, and applicators) must wear:

- Long sleeved shirt and long pants
- Shoes and socks
- Chemical-resistant gloves such as barrier laminate, butyl rubber, nitrile rubber, neoprene rubber, polyvinyl chloride, and viton

After the product is diluted in accordance with label directions for use, shirt, pants, socks, shoes, and waterproof gloves are sufficient. Follow manufacturer's instructions for cleaning/maintaining PPE. If no such instructions for washables exist, use detergent and hot water. Keep and wash PPE separately from other laundry.

USER SAFETY RECOMMENDATIONS

Users should:

- 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 this product. Wash the outside of gloves before removing. As soon as possible, wash thoroughly and change into clean clothing.

ENVIRONMENTAL HAZARDS

This pesticide is extremely toxic to fish and aquatic invertebrates. Do not apply directly to water, to areas where surface water is present or to intertidal areas below the mean high water mark. Drift and run-off from treated areas may be hazardous to aquatic organisms in neighboring areas. Do not contaminate water when disposing of equipment washwaters. Care should be used when spraying to avoid fish and reptile pets in/around ornamental ponds.

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 if bees are visiting the treatment area.

PHYSICAL AND CHEMICAL HAZARDS

Do not apply water-based dilutions of **Bifen 7.9F Select** to electrical conduits, motor housings, junction boxes, switch boxes, or other electrical equipment because of possible shock hazard.

DIRECTIONS FOR USE

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

USE RESTRICTIONS:

- Do not apply a broadcast application to interior surfaces of homes.
- Do not apply this product through any kind of irrigation system.
- Do not apply by air.
- **Do not apply in greenhouses and nurseries.**
- Not for use on sod farm turf, golf course turf, or grass grown for seed.

NON-AGRICULTURAL USE REQUIREMENTS

The requirements in this box only 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 out of treated areas until sprays have dried.

BIFEN 7.9F SELECT™

INSECTICIDE

Formula for Determining the Active Ingredient Content of the Finished Spray Mixture

Use the following formula to determine the percent active ingredient that is in the spray tank after mixing **Bifen 7.9F Select**:

$$\frac{(7.9)(\text{Fl. Oz. of Bifen 7.9F Select added to tank})}{(\text{Gallons of finished spray mix})(128)} = \text{Percent Active Ingredient of spray mix}$$

IMPREGNATION AND APPLICATION OF BIFEN 7.9F SELECT ON DRY BULK LAWN FERTILIZERS

Bifen 7.9F Select may be impregnated on dry bulk fertilizers. When applied as directed, **Bifen 7.9F Select**/dry bulk fertilizer mixtures provide insect control equal to that provided by the same rates of **Bifen 7.9F Select** applied in water.

Impregnation: Apply using a minimum of 2.3 pounds of dry bulk fertilizer per 1,000 sq. ft. with the required amount of **Bifen 7.9F Select** per 1,000 sq. ft. Use a closed rotary-drum mixer or a similar type of closed blender equipped with suitable spray equipment. Position the spray nozzle(s) to provide a uniform, fine, spray pattern over the tumbling fertilizer for thorough coverage. The physical properties of fertilizers vary, particularly in liquid absorptive capacity. When absorptivity is sufficient, simple spray impregnation of the fertilizer with **Bifen 7.9F Select** provides a satisfactory dry mixture. If the absorptive capacity is inadequate, use of a highly absorptive powder is required to provide a dry, flowable mixture. Microcel E (Johns-Manville Products Corporation) is a recommended absorbent powder. Generally less than 2% by weight of Microcel E is required. **DO NOT** impregnate **Bifen 7.9F Select** onto straight coated ammonium nitrate or straight limestone because these materials will not absorb the insecticide. Dry fertilizer blends containing mixtures of ammonium nitrate or limestone may be impregnated with **Bifen 7.9F Select**.

The amount of **Bifen 7.9F Select** actually required in the preparation of individual fertilizer mixtures should be determined carefully for each production operation. This is necessary to ensure that the amount of pesticide actually contained in the mixture applied to the soil represents the correct rate of use. Bulk fertilizer impregnated with **Bifen 7.9F Select** should be applied immediately, not stored.

All individual Federal and State regulations relating to bulk dry fertilizer blending, registration, labeling, and application of the mixtures are the responsibility of the individual and/or company selling the fertilizer and **Bifen 7.9F Select** mixture.

Fertilizer for this use should be Grass/Lawn fertilizers recommended for specific regions.

APPLICATION INSTRUCTIONS AND RESTRICTIONS

Not for use on plants being grown for sale or other commercial use, or for commercial seed production, or for research purposes. For use on plants intended only for aesthetic purposes or climatic modifications and being grown in interior plantscapes, ornamental gardens or parks, or lawns and grounds.

Bifen 7.9F Select mixes readily with water and other aqueous carriers, and controls listed insects and mites on trees, shrubs, foliage plants, non-bearing fruit and nut trees, and flowers in interiorscapes including hotels, shopping malls, office buildings, and outdoor plantscapes, including around residential dwellings, parks, institutional buildings, recreational areas, athletic fields, and home lawns. Non-bearing crops are perennial crops that will not produce a harvestable raw agricultural commodity during the season of application.

Bifen 7.9F Select can be tank-mixed with other pesticides, including insect growth regulators. When tank mixing **Bifen 7.9F Select** with other pesticides, follow the most restrictive precautions and limitations on each separate product label. The physical compatibility of **Bifen 7.9F Select** may vary with different sources of pesticide products, and local cultural practices. If any tank mixture which has not been previously tested, it should be tested on a small scale (pint or quart jar), using the proper proportions of pesticides and water to ensure the physical compatibility of the mixture.

Follow this procedure for preparing a new tank mix, unless specified otherwise in label directions:

1. Add wettable powder to tank water, maintain agitation.
2. Add liquids and flowables, maintain agitation.
3. Add emulsifiable concentrates, maintain agitation.

If a mixture is incompatible following this order of addition, try reversing the order of addition, or increase the volume of water. **Note:** If the tank-mixture is compatible after increasing the amount of water, then the sprayer will need to be recalibrated for a higher volume application. Do not allow tank mix to stand overnight.

RESISTANCE MANAGEMENT

Some insects are known to develop resistance to products used repeatedly for control. Because the development of resistance cannot be predicted, the use of this product must conform to resistance management strategies established for the use area. Consult your local or state pest management authorities for details.

If resistance to this product develops in your area, this product, or other products with a similar mode of action, may not provide adequate control. If poor performance cannot be attributed to improper application or extreme weather conditions, a resistant strain of insect may be present. If you experience difficulty with control and suspect that resistance is a reasonable cause, immediately consult your local company representative or pest management advisor for the best alternative method of control for your area.

BIFEN 7.9F SELECT™

INSECTICIDE

APPLICATION

LAWNS: Apply **Bifen 7.9F Select** as a surface or sub-surface treatment. Use application volumes of up to 10 gallons per 1,000 square feet to get uniform coverage when treating dense grass foliage.

For low volume applications, less than 2 gallons/ 1,000 square feet, immediate irrigation of treated area with at least 0.25 inches of water following application to ensure efficacy of listed sub-surface pests, including, Mole Crickets.

LAWN APPLICATION RATES

The application rates listed in the following table will provide excellent control of the respective pests under typical conditions. However, at the discretion of the applicator, **Bifen 7.9F Select** may be applied at up to 1 fluid oz. per 1,000 square feet to control each of the pests listed in this Table. Use the higher application rates within the specified rate range when maximum residual control is desired.

PEST	APPLICATION RATE BIFEN 7.9F SELECT
Armyworms ¹ Cutworms ¹ Sod Webworm ¹	0.18 - 0.25 fluid oz. per 1,000 sq. ft.
Annual Bluegrass Weevil (<i>Hyperodes</i>) (Adult) ² Banks Grass Mite ⁶ Billbugs (Adult) ³ Black Turfgrass Ataenius (Adult) ⁴ Centipedes Chinch Bugs ⁵ Crickets Earwigs Fleas (Adult) Grasshoppers Leafhoppers Mealybugs Millipedes Mites ⁵ Pillbugs Sowbugs	0.25 - 0.5 fluid oz. per 1,000 sq. ft.
Ants Fleas (Larvae) ⁷ Imported Fire Ants ⁸ Japanese Beetle (Adult) Mole Cricket (Adult) ⁹ Mole Cricket (Nymph) ¹⁰ Ticks ¹¹	0.5 - 1.0 fluid oz. per 1,000 sq. ft.

COMMENTS

Armyworms, Cutworms and Sod Webworms: For optimum control, delay watering (irrigation) or mowing for 24 hours after application. If the grass area is at a mowing height of greater than 1 inch, then higher application rates (Up to 1 fluid oz. per 1,000 square feet) may be required during periods of high pest pressure.

Annual Bluegrass Weevil (*Hyperodes*) adults: Time applications to control adult weevils as they leave their overwintering sites and move in to grass areas. This movement generally begins when *Forsythia* is in full bloom and concludes when flowering dogwood (*Cornus florida*) is in full bloom. Consult your State Cooperative Extension Service for more specific information regarding application timing.

Billbug adults: Make applications when adult billbugs are first observed during April and May. Degree day models have been developed to optimize application timing. Consult your State Cooperative Extension Service for information specific to your region. In temperate regions, spring applications targeting billbug adults will also provide control of over-wintered chinch bugs.

Black Turfgrass Ataenius adults: Make applications during May and July to control the first and second generation of black turfgrass ataenius adults, respectively. Time the May application to coincide with the full bloom stage of Vanhoutte Spiraea (*Spiraea vanhouttei*) and horse chestnut (*Aesculus hippocastanum*).

Time the July application to coincide with the blooming of Rose of Sharon (*Hibiscus syriacus*).

BIFEN 7.9F SELECT™

INSECTICIDE

COMMENTS

⁵Chinch Bugs: Chinch bugs infest the base of grass plants and are often found in the thatch layer. Irrigating the grass area before treatment will optimize the penetration of the insecticide to the area where the chinch bugs are located. Use higher volume applications if the thatch layer is excessive or if a relatively long mowing height is being maintained. Chinch Bugs can be one of the most difficult pests to control in grasses and the higher application rates (Up to 1 fluid oz. per 1,000 square feet) may be required to control populations that contain both nymphs and adults during the middle of the summer.

⁶Mites: For optimal control of eriophyid mites, apply in combination with the labeled application rate of a surfactant. A second application five to seven days after the first may be necessary to achieve acceptable control.

⁷Flea Larvae: Flea larvae develop in the soil of shaded areas that are accessible to pets or other animals. Use a higher volume application when treating these areas to ensure penetration of the insecticide into the soil. Note: If the lawn area is being treated with **Bifen 7.9F Select** at 0.25 fluid oz. per 1,000 square feet for adult flea control, then the larval application rate may be achieved by increasing the application volume two-to four- fold.

⁸Imported Fire Ants: Control will be optimized by combining broadcast applications that will control foraging workers and newly mated fly-in queens with mound drenches that will control existing colonies. If the soil is not moist, then it is important to irrigate before application or use a high volume application.

For broadcast treatments apply 1 fluid oz. per 1,000 square feet. Treat mounds by diluting 1 teaspoon of **Bifen 7.9F Select** per gallon of water and apply 1 to 2 gallons of finished spray per mound. Treat the mounds with sufficient force to break their apex and allow the insecticide solution to flow into the ant tunnels. Treat with a four foot diameter circle around the mound. For best results, apply in cool weather (65-80°F) or in early morning or late evening hours. Note: a spray rig that is calibrated to apply 1 fluid oz. per 1,000 square feet of **Bifen 7.9F Select** in 5 gallons per 1,000 square feet contains the approximate dilution (1 teaspoon per gallon) that is required for fire ant mound drenches in the spray tank.

⁹Mole Cricket adults: Achieving acceptable control of adult mole crickets is difficult because preferred grass areas are subject to continuous invasion during the early spring by this extremely active stage. Make applications as late in the day as possible and water in with up to 0.5 inches of water immediately after treatment. If the soil is not moist, then it is important to irrigate before application to bring the mole crickets closer to the soil surface where contact with the insecticide will be maximized. Treat grass areas that receive pressure from adult mole crickets at peak egg hatch to ensure optimum control of subsequent nymph populations (see below).

¹⁰Mole Cricket nymphs: Treat grass areas that received intense adult mole cricket pressure in the spring immediately prior to peak egg hatch. Optimal control is achieved at this time because young nymphs are more susceptible to insecticides and they are located near the soil surface where the insecticide is most concentrated. Control of larger, more damaging, nymphs later in the year may require both higher application rates and more frequent application to maintain acceptable control. Make applications as late in the day as possible and water in with up to 0.5 inches of water immediately after treatment. If the soil is not moist, then it is important to irrigate before application to bring the mole crickets closer to the soil surface where contact with the insecticide will be maximized.

¹¹Ticks (Including ticks that may transmit Lyme Disease and Rocky Mountain Spotted fever): Do not make spot applications. Treat entire area where exposure to ticks may occur. Use the higher spray volumes when treating areas with dense ground cover or heavy leaf litter. Ticks may be reintroduced from surrounding areas on host animals. Retreatment may be necessary to achieve and/or maintain control during periods of high pest pressure. Repeat application is necessary only if there are signs of renewed activity. Repeat applications must be limited to no more than once per seven days.

Deer Ticks (*Ixodes sp.*) have a complicated life cycle that ranges over a two year period and involves four-life stages. Make applications in the late fall and/or early spring to control adult ticks that are usually located on brush or grass above the soil surface and in mid to late spring to control larvae and nymphs that reside in the soil and leaf litter.

American dog ticks can be a considerable nuisance in suburban settings, particularly where homes are built on land that was previously field or forest. These ticks commonly congregate along paths or roadways where humans are likely to be encountered. Make applications as necessary from mid-spring to early fall to control American dog tick larvae, nymphs and adults.

BIFEN 7.9F SELECT™

INSECTICIDE

Bifen 7.9F Select Lawn Dilution Chart

APPLICATION VOLUME:	APPLICATION RATE:	FLUID OUNCES* OF BIFEN 7.9F SELECT DILUTED TO THESE VOLUMES OF FINISHED SPRAY			
GALLONS PER 1,000 SQ. FT.	FLUID OUNCES PER 1,000 SQ. FT.	1 GALLON	5 GALLONS	10 GALLONS	100 GALLONS
1.0	0.18	0.18	0.90	1.8	18.0
1.0	0.25	0.25	1.25	2.5	25.0
1.0	0.5	0.5	2.5	5.0	50.0
1.0	1.0	1.0	5.0	10.0	100.0
2.0	0.18	-	0.45	0.90	9.0
2.0	0.25	0.13	0.63	1.25	12.5
2.0	0.5	0.25	1.25	2.5	25.0
2.0	1.0	0.5	2.5	5.0	50.0
3.0	0.18	-	0.30	0.60	6.0
3.0	0.25	-	0.42	0.83	8.3
3.0	0.5	0.17	0.83	1.67	16.7
3.0	1.0	0.33	1.67	3.33	33.3
4.0	0.18	-	0.23	0.45	4.5
4.0	0.25	-	0.31	0.63	6.3
4.0	0.5	0.13	0.63	1.25	12.5
4.0	1.0	0.25	1.25	2.5	25.0
5.0	0.18	-	0.18	0.36	3.6
5.0	0.25	-	0.25	0.5	5.0
5.0	0.5	0.1	0.5	1.0	10.0
5.0	1.0	0.2	1.0	2.0	20.0
10.0	0.18	-	-	0.18	1.8
10.0	0.25	-	0.13	0.25	2.5
10.0	0.5	-	0.25	0.5	5.0
10.0	1.0	0.1	0.5	1.0	10.0

*To convert to millimeters, multiply by 29.57

1 fluid ounce = 29.57 ml = 2 tablespoons = 6 teaspoons

Do not use household utensils to measure Bifen 7.9F Select.

ORNAMENTALS AND TREES

For ornamental applications (including trees, shrubs, ground covers, bedding plants, and foliage plants) apply 0.125 to 1.0 fl. oz. of **Bifen 7.9F Select** per 1,000 square feet or 5.4 to 43.5 fl. oz. per 100 gallons. Dilute and apply **Bifen 7.9F Select** in various volumes of water providing that the maximum label rate (1.0 fluid oz. per 1,000 square feet or 43.5 fl. oz. per 100 gallons.) is not exceeded. Apply **Bifen 7.9F Select** through low volume application equipment by dilution with water or other carriers and providing that the maximum label rate (1.0 fluid oz. per 1,000 square feet or 43.5 fl. oz. per 100 gallons) is not exceeded.

Apply the specified application rate as a full coverage foliar spray. Repeat treatment as necessary to achieve control using higher application rates within the specified rate range as pest pressure & foliage area increases. Repeat application must be limited to no more than once per seven days.

Certain cultivars may be sensitive to the final spray solution. Treat a small number of plants and observe for one week prior to application to the entire planting.

Use an alternate class of chemistry in a treatment program to prevent or delay pest resistance.

BIFEN 7.9F SELECT™

INSECTICIDE

Bifen 7.9F Select Ornamental Dilution Chart

APPLICATION VOLUME: GALLONS PER		APPLICATION RATE: FL OZ. PER	FLUID OUNCES* OF BIFEN 7.9F SELECT DILUTED TO THESE VOLUMES OF FINISHED SPRAY			
1,000 sq. ft.	Acre	1,000 sq. ft.	1 gallon	5 gallons	10 gallons	100 gallons
2.3	100	0.125	-	0.27	0.54	5.4
2.3	100	0.25	0.11	0.54	1.08	10.8
2.3	100	0.5	0.22	1.09	2.17	21.7
2.3	100	1.0	0.44	2.17	4.35	43.5
4.6	200	0.125	-	0.14	0.27	2.7
4.6	200	0.25	-	0.27	0.54	5.4
4.6	200	0.5	0.11	0.54	1.09	10.9
4.6	200	1.0	0.22	1.09	2.17	21.7
6.9	300	0.125	-	-	0.18	1.8
6.9	300	0.25	-	0.18	0.36	3.6
6.9	300	0.5	-	0.36	0.72	7.2
6.9	300	1.0	0.15	0.72	1.45	14.5

*To convert to millimeters, multiply by 29.57

300 gallons per acre is a typical application volume for landscape ornamental applications.

1 fluid ounce = 29.57 ml = 2 tablespoons = 6 teaspoons

Do not use household utensils to measure Bifen 7.9F Select.

Calculating Dilution Rates using the Ornamental Application Rates Table and the Bifen 7.9F Select Ornamental Dilution Chart

Take the following steps to determine the appropriate dilution of **Bifen 7.9F Select** that is required to control specific pests:

1. Identify the least susceptible target pest (the pest requiring the highest application rate for control).
2. Select an application rate in terms of fluid oz. of **Bifen 7.9F Select**.
3. Identify your application volume and how much spray mix you want to prepare.
4. Use the Ornamental Dilution Chart to determine the appropriate volume of **Bifen 7.9F Select** that must be mixed in your desired volume of water.

For example, suppose you are trying to control black vine weevil adults on rhododendron. The Ornamental Application Rates table shows that 0.25 to 0.5 fluid ounces of **Bifen 7.9F Select** should be applied per 1,000 square feet. You select an application rate of 0.5 fluid oz. per 1,000 square feet because maximum residual control is desired. Your application volume is approximately 300 gallons per acre, which is equivalent to 6.9 gallons per 1,000 square feet. Consulting the Ornamental Dilution Chart reveals that you should dilute 0.72 fluid oz. of **Bifen 7.9F Select** in 10 gallons of water.

BIFEN 7.9F SELECT™

INSECTICIDE
ORNAMENTAL APPLICATION RATES

The application rates listed in the following table will provide excellent control of the respective pests under typical conditions. However, at the discretion of the applicator, **Bifen 7.9F Select** may be applied at up to 1 fluid oz. per 1,000 square feet. (43.5 fl. oz. per 100 gallons) to control each of the pests listed in this table. Use the higher application rates within the specified rate range when maximum residual control is desired.

PEST	APPLICATION RATE BIFEN 7.9F SELECT	
	FLUID OUNCES PER 1,000 SQUARE FT.	FLUID OUNCES PER 100 GALLONS
Bagworms ¹² Cutworms Elm Leaf Beetles Fall Webworms Gypsy Moth Caterpillars Lace Bugs Leaf Feeding Caterpillars Tent Caterpillars	0.125 - 0.25	5.4 - 10.8
Adelgids Ants Aphids Bees Beet Armyworm Beetles ¹³ Black Vine Weevil (Adults) Brown Soft Scales Broad Mites Budworms California Red Scale (Crawlers) ¹³ Centipedes Cicadas Citrus Thrips Clover Mites Crickets Diaprepes (Adults) Earwigs European Red Mite Flea Beetles Fungus Gnats (Adults) Grasshoppers Japanese Beetle (Adult) Leafhoppers Leafrollers Mealybugs Millipedes Mites Mosquitoes Orchid Weevil Pillbugs Pine Needle Scales (Crawlers) ¹³ Plant Bugs (Including <i>Lygus</i> spp.) Psyllids San Jose Scales (Crawlers) ¹³ Scorpions Sowbugs Spider Mites Spiders Spittlebugs Thrips Tip Moths Treehoppers Twig Borers ¹³ Wasps Weevils ¹³ Whiteflies	0.25 - 0.5	10.8 - 21.7
Imported Fire Ants** Leafminers Pecan Leaf Scorch Mite Pine Shoot Beetle (Adults) Spider Mites ¹⁴	0.5 - 1.0	21.7 - 43.5

BIFEN 7.9F SELECT[™]

INSECTICIDE

COMMENTS

¹²**Bagworms:** Apply when larvae begin to hatch and spray larvae directly. Applications when larvae are young will be most effective.¹³**Beetles, Scale Crawlers, Twig Borers, and Weevils:** Treat trunks, stems and twigs in addition to plant foliage.

¹⁴**Spider Mites:** **Bifen 7.9F Select** provides optimal two-spotted spider mite control when applied during spring to mid-summer. Higher application rates and/or more frequent treatments may be required for acceptable two-spotted spider mite control during mid- to late-summer. The addition of a surfactant or horticultural oil may increase the effectiveness of **Bifen 7.9F Select**. Combinations of **Bifen 7.9F Select** with other registered miticides have also proven effective. Alternately, **Bifen 7.9F Select** applications may be rotated with those of other products that have different modes of action in control programs that are designed to manage resistance by twospotted spider mites. Consult your local Cooperative Extension Service for resistance management recommendations in your region.

**For foraging ants.

PEST CONTROL ON OUTSIDE SURFACES AND AROUND BUILDINGS

For control of Ants, Carpenter Ants, Armyworms, Bees, Beetles, Biting Flies, Boxelder Bugs, Centipedes, Chiggers, Chinch Bugs, Clover Mites, Crickets, Cutworms, Dichondra Flea Beetles, Earwigs, Elm Leaf Beetles, Firebrats, Fleas, Flies, Gnats, Grasshoppers, Japanese Beetles, Midges, Millipedes, Mosquitoes, Moths, Roaches (including Cockroaches), Scorpions, Silverfish, Sod Webworms, Sowbugs (Pillbugs), Spider Mites, Spiders (including Black Widow Spiders), Springtails, Ticks (including Brown Dog Ticks), and Wasps.

Apply **Bifen 7.9F Select** using a 0.02 to 0.06% suspension as a residual spray to outside surfaces of buildings including exterior siding, foundations, porches, window frames, eaves, patios, garages, refuse dumps, lawns such as grass areas adjacent or around private homes, duplexes, townhouses, condominiums, house trailers, apartment complexes, carports, garages, fence lines, storage sheds, barns, and other residential and non-commercial structures, soil, trunks of woody ornamentals and other areas where pests congregate or have been seen. Use a spray volume of up to 10 gallons of emulsion per 1,000 square feet. Higher application volumes may be used to obtain the desired coverage of dense vegetation or landscaping materials.

Mixing Directions: For 0.02% suspension, mix 0.33 fluid oz. of **Bifen 7.9F Select** per gallon of water. For 0.06% suspension, mix 1 fluid oz. **Bifen 7.9F Select** per gallon of water (1 fluid oz. = 2 tablespoons). Do not use household utensils to measure **Bifen 7.9F Select**. Use the higher rates within the specified rate range (or higher listed rates) for heavy pest infestation, quicker knockdown or longer residual control. Retreatment may be necessary to achieve and/or maintain control during periods of high pest pressure. Repeat application is necessary only if there are signs of renewed insect activity. Repeat application must be limited to no more than once per seven days.

Perimeter Treatment: Apply to a band of soil and vegetation 6 to 10 feet wide around and adjacent to the structure. Also, treat the foundation of the structure to a height of 2 to 3 feet. Apply 0.33 to 1.0 fluid oz. of **Bifen 7.9F Select** per 1,000 square feet in sufficient water to provide adequate coverage (refer to Perimeter Application Dilution Chart).

BIFEN 7.9F SELECT™

INSECTICIDE

Bifen 7.9F Select Perimeter Application Dilution Chart

APPLICATION VOLUME: GALLONS PER	APPLICATION RATE: FLUID OUNCES PER	FLUID OUNCES* OF BIFEN 7.9F SELECT DILUTED TO THESE VOLUMES OF FINISHED SPRAY			
		1 GALLON	5 GALLONS	10 GALLONS	100 GALLONS
1,000 SQ. FT.	1,000 SQ. FT.				
1	0.33	0.33	1.67	3.33	33.3
1	0.5	0.5	2.5	5.0	50.0
1	0.67	0.67	3.33	6.67	66.7
1	0.75	0.75	3.75	7.5	75.0
1	1.0	1.0	5.0	10.0	100.0
2	0.33	0.17	0.83	1.65	16.5
2	0.5	0.25	1.25	2.5	25.0
2	0.67	0.33	1.67	3.35	33.5
2	0.75	0.38	1.88	3.75	37.5
2	1.0	0.5	2.5	5.0	50.0
3	0.33	0.11	0.55	1.10	11.0
3	0.5	0.17	0.83	1.67	16.7
3	0.67	0.22	1.11	2.23	22.3
3	0.75	0.25	1.25	2.5	25.0
3	1.0	0.33	1.67	3.33	33.3
4	0.33	-	0.41	0.83	8.3
4	0.5	0.13	0.63	1.25	12.5
4	0.67	0.17	0.84	1.67	16.7
4	0.75	0.19	0.94	1.88	18.8
4	1.0	0.25	1.25	2.5	25.0
5	0.33	-	0.33	0.67	6.7
5	0.5	0.1	0.5	1.0	10.0
5	0.67	0.13	0.67	1.33	13.3
5	0.75	0.15	0.75	1.5	15.0
5	1.0	0.2	1.0	2.0	20.0
10	0.33	-	0.17	0.33	3.3
10	0.5	-	0.25	0.5	5.0
10	0.67	-	0.33	0.67	6.7
10	0.75	-	0.38	0.75	7.5
10	1.0	0.1	0.5	1.0	10.0

*To convert to milliliters, multiply by 29.57

1 fluid oz. = 29.57 ml = 2 tablespoons = 6 teaspoons

Do not use household utensils to measure Bifen 7.9F Select.

For Ant and Fire Ant Mounds use Bifen 7.9F Select 0.06% emulsion as Drench Method: Apply 1-2 gallons of emulsion to each mound area by sprinkling the mound until it is wet and treat a 4 foot diameter circle around the mound. Use the higher volume for mounds larger than 12". For best results, apply in cool weather, such as in early morning or late evening hours, but not in the heat of the day.

Mosquito Control: Dilute 0.33 to 1.0 fl. oz. of **Bifen 7.9F Select** per gallon of water and apply at the rate of one gallon of dilution per 1,000 square feet as a general spray around landscapes, lawn and buildings to control mosquitoes. For higher volume applications, **Bifen 7.9F Select** may be diluted at lower concentrations and applied at greater volumes to deliver the desired amount of product per area (refer to the Ornamental or Perimeter Application Dilution Charts).

BIFEN 7.9F SELECT™

INSECTICIDE

INDOOR USE

In the home, cover all food processing surfaces and utensils during treatment or thoroughly wash before use. Cover or remove exposed food. Do not apply a broadcast application to interior surfaces of homes.

For control of ants, bees, beetles, boxelder bugs, centipedes, clothes moths, cockroaches, crickets, earwigs, firebrats, flies, gnats, midges, millipedes, pillbugs, scorpions, silverfish, sowbugs, spiders, ticks, and wasps.

Use a 0.02% to 0.06% suspension (0.33 to 1 fluid oz. per gallons of water) for residual pest control in buildings and structures and on modes of transport. Apply either as a crack and crevice, pinstream, spot, coarse, low-pressure spray (25 psi or less) or with a paint brush.

Indoor Treatments: Apply as a coarse, low pressure, crack and crevice or spot spray to areas where pests hide, such as baseboards, corners, storage areas, closets, around water pipes, doors and windows, attics and eaves, behind and under refrigerators, cabinets, sinks, furnaces, stoves, the underside of shelves, drawers. Do not use as a space spray. Pay particular attention to cracks and crevices.

Mixing Directions: See mixing directions in "Pest Control on Outside Surfaces and Around Buildings" section.

Dilute **Bifen 7.9F Select** with water for spray or brush application. Fill sprayer with the desired volume of water and add **Bifen 7.9F Select**. Close and shake before use in order to insure proper mixing. Mix only the amount of solution needed for the application. Retreatment may be necessary to achieve and/or maintain control during periods of high pest pressure. Repeat application is necessary only if there are signs of renewed insect activity. Repeat application must be limited to no more than once per seven days.

Cockroaches, Crickets, Firebrats, Scorpions, Silverfish, Spiders, and Ticks: Apply as a coarse, low pressure spray to areas where these pests hide, such as baseboards, corners, storage areas, closets, around water pipes, doors and windows, attics and eaves, behind and under refrigerators, cabinets, sinks, furnaces, and stoves, the underside of shelves, drawers, and similar areas. Pay particular attention to cracks and crevices.

Ants: Apply to any trails, around doors and windows and other places where ants may be found.

Bees and Wasps: Make application to nests late in the evening when insects are at rest. Thoroughly spray nest and entrance and surrounding areas where insects alight.

Boxelder Bugs, Centipedes, Earwigs, Beetles, Millipedes, Pillbugs, and Sowbugs: Apply around doors and windows and other places where these pests may be found or where they may enter premises. Spray baseboards, storage areas and other locations.

FOOD/FEED HANDLING ESTABLISHMENT APPLICATIONS

Applications of this product are permitted in both food/feed areas and non-food areas of food/feed handling establishments as a general surface, spot, or crack and crevice treatment.

Food/feed handling establishments are defined as places other than private residences in which exposed food/feed is held, processed, prepared or served. Include also are areas for receiving, storing, packing (canning, bottling, wrapping, boxing), preparing, edible waste storage, and enclosed processing systems (mills, dairies, edible oils, syrups) of food. Serving areas where food is exposed and the facility is in operation are also considered food areas.

Permitted nonfood/feed areas of use include garbage rooms, lavatories, floor drains (to sewers), entries and vestibules, offices, locker rooms, machine rooms, garages, mop closets and storage (after canning or bottling).

Permitted use sites include: aircraft (Do not use in aircraft cabins), apartment buildings, bakeries, bottling facilities, breweries, buses, cafeterias, candy plants, canneries, dairy product processing plants, food manufacturing plants, food processing plants, food service establishments, granaries, grain mills, hospitals, hotels, industrial buildings, laboratories, meat/poultry/egg processing plants, mobile/motor homes, nursing homes, offices, railcars, restaurants, schools, ships, trailers, trucks, vessels, warehouses, and wineries.

General Surface Application: Do not use this application method in food/feed handling establishments when the facility is in operation or the foods/feeds are exposed. Do not apply directly to food products. Cover or remove all food processing and/or handling equipment during application. After application in food processing plants, bakeries, cafeterias and similar facilities, wash all equipment, benches, shelving, and other surfaces which food will contact. Clean food handling or processing equipment and thoroughly rinse with clean fresh water.

Spot, Crack and Crevice Application: Spot or crack and crevice applications may be made while the facility is in operation; however, cover or remove food from area being treated. Do not apply directly to food.

BIFEN 7.9F SELECT™

INSECTICIDE

Foam Applications

Bifen 7.9F Select may be converted to foam and used to treat structural voids. Dilute 0.33 to 1.0 fluid oz. of **Bifen 7.9F Select** per gallon of water and add the manufacturers recommended volume of foaming agent to produce a 0.02 to 0.06 percent foam concentration. Verify before treatment that the foaming agent is compatible with **Bifen 7.9F Select**.

TERMITE CONTROL (ABOVE GROUND ONLY)

The purpose of the applications described below is to kill termite workers or winged reproductives that may be present at the time or treatment. These applications are intended as supplements to, and not substitutes for, mechanical alteration, soil treatment or foundation treatment.

To control exposed workers and winged reproductive termites in localized areas, dilute 1.0 fluid ounce of **Bifen 7.9F Select** per gallon of water and apply as a course fan spray at the rate of one gallon per 1,000 square feet to attics, crawl spaces, unfinished basements and other void areas. Treat swarming termites as well as the areas in which they congregate.

To control above-ground termites in localized areas of infested wood, dilute 1.0 fluid oz. of **Bifen 7.9F Select** per gallon of water and apply as a liquid or foam to voids and galleries in damaged wood as well as to spaces between wooden structural members and between the sill plate and foundation where wood is vulnerable to attack. Applications may be made to inaccessible areas by drilling and then injecting the dilution or foam, with a suitable directional injector, into damaged wood or wall voids. All treatment holes drilled in construction elements in commonly occupied areas of structures should be securely plugged after treatment.

To control termite carton nests in building voids, dilute 1.0 fluid oz. of **Bifen 7.9F Select** per gallon of water and apply as liquid or foam using a pointed injection tool. Multiple injection points and varying depths of injection may be necessary to achieve control. When possible, remove the carton nest material from the building void after treatment.

ANT CONTROL

Nuisance Ants Indoors: For best results, locate and treat ant nests. Dilute 0.5 to 1.0 fluid oz. of **Bifen 7.9F Select** per gallon of water and apply at the rate of one gallon of dilution per 1,000 square feet as a general surface, crack and crevice or spot treatment to areas where ants have been observed or are expected to forage. These areas include: baseboards, in and behind cabinets, under and behind dishwashers, furnaces, refrigerators, sinks and stoves, around pipes, cracks and crevices and in corners. Treat entry points into the home or premises such as around doors and windows. When using **Bifen 7.9F Select** in combination with baits, apply **Bifen 7.9F Select** as instructed above, and use baits in other areas that have not been treated with **Bifen 7.9F Select**.

Nuisance Ants Outdoors: For best results, locate and treat ant nests. Apply **Bifen 7.9F Select** to ant trails around doors and windows and other places where ants have been observed or are expected to forage. Apply a perimeter treatment using either low or high volume applications described in the "Pest Control on Outside Surfaces and Around Buildings" section of this label. The higher dilutions and/or application volumes, as well as more frequent applications, may be necessary when treating concrete surfaces for ant control. Maximum control is generally achieved using the following procedure:

1. Treat non-porous surfaces with low volume applications using 0.5 to 1.0 fluid oz. of **Bifen 7.9F Select** per gallon of water and applying this dilution at the rate of one gallon per 1,000 square feet.
2. Treat porous surfaces and vegetation with high volume applications using dilutions that are calculated to deliver 0.5 to 1.0 fluid oz. of **Bifen 7.9F Select** per 1,000 square feet (refer to the Ornamental and Perimeter Application Dilution Charts).
3. For maximum residual control, dilute 0.5 to 1.0 fluid oz. of **Bifen 7.9F Select** per gallon of water and apply at a rate of up to 10 gallons of dilution per 1,000 square feet.

Carpenter Ants Indoors: Dilute 0.5 to 1.0 fluid oz. of **Bifen 7.9F Select** per gallon of water and apply at the rate of one gallon of dilution per 1,000 square feet as a general surface, crack and crevice or spot treatment to areas where carpenter ants have been observed or are expected to forage. These areas include baseboards, in and behind cabinets, under and behind dishwashers, furnaces, refrigerators, sinks, and stoves, around pipes, cracks and crevices, and in corners. Treat entry points into the home or premises such as around doors and windows. Spray or foam into cracks into crevices or drill holes and spray, mist or foam into voids where carpenter ants or their nests are present. When using **Bifen 7.9F Select** in combination with baits, apply **Bifen 7.9F Select** as instructed above, and use baits in other areas that have not been treated with **Bifen 7.9F Select**.

BIFEN 7.9F SELECT™

INSECTICIDE

Carpenter Ants Outdoors: Apply **Bifen 7.9F Select** to carpenter ant trails around doors and windows and other places where carpenter ants have been observed or are expected to forage. For best results, locate and treat carpenter ant nests. Apply a perimeter treatment using either low or high volume applications described in the “Pest Control on Outside Surfaces and Around Buildings” section of this label. The higher dilutions and/or application volumes, as well as more frequent applications, may be necessary when treating concrete surfaces for carpenter ant control. Maximum control is generally achieved using the following procedure:

1. Treat non-porous surfaces with low volume applications using 0.5 to 1.0 fluid oz. of **Bifen 7.9F Select** per gallon of water and applying this dilution at the rate of one gallon per 1,000 square feet.
2. Treat the trunks of trees that have carpenter ant trails, or upon which carpenter ants are foraging, using 0.5 to 1.0 fl. oz. of **Bifen 7.9F Select** per gallon of water and applying this dilution to thoroughly wet the bark from the base of the tree to as high as possible on the trunk
3. Treat porous surfaces and vegetation with high volume applications using dilutions that are calculated to deliver 0.5 to 1.0 fluid oz. of **Bifen 7.9F Select** per 1,000 square feet (refer to the Ornamental and Perimeter Application Dilution Charts).
4. For maximum residual control, dilute 0.5 to 1.0 fluid oz. of **Bifen 7.9F Select** per gallon of water and apply at a rate of up to 10 gallons of dilution per 1,000.

To control carpenter ants inside trees, utility poles, fencing or deck materials and similar structural members, drill to locate the interior infested cavity and inject or foam a 0.06% dilution (1.0 fl. oz. of **Bifen 7.9F Select** per gallon of water) into the cavity using a sufficient volume and an appropriate treatment tool with a splash-back guard.

To control carpenter ants that are tunneling in the soil, dilute 0.5 to 1.0 fluid ounces of Bifen 7.9F Select per gallon of water and apply as a drench or inject the dilution or foam at intervals of 8 to 12 inches. Establish a uniform vertical barrier at the edges of walls, driveways or other hard surfaces where ants are tunneling beneath the surfaces.

For wood piles and stored lumber apply a 0.06% emulsion. Use a hose-end sprayer or sprinkling can to deliver a coarse drenching spray. Treated wood can be burned or used for lumber one month after treatment. Do not use in structures.

To protect firewood from carpenter ants (and termites), dilute 1.0 fluid oz. of **Bifen 7.9F Select** per gallon of water and apply to the soil beneath where the firewood will be stacked at the rate of one gallon of dilution per 8 square feet.

Ant Control Restrictions:

- **DO NOT** treat firewood with this product.
- **DO NOT** allow people or pets on treated surfaces until spray has dried. Do not allow people or pets on contact surfaces until spray has dried. Do not treat pets with this product.
- **DO NOT** apply this product when classrooms are in use.
- **DO NOT** apply this product in occupied patient rooms, or in any rooms occupied by the infirm, elderly or children for extended periods of time.
- **DO NOT** apply water-based dilutions of this product to electrical equipment because of possible shock hazard.
- **DO NOT** apply this product in livestock buildings (barns).

Application equipment that delivers low volume treatments, such as the Micro-Injector® or Actisol® applicators, may also be used to make crack and crevice, deep harborage, spot and general surface treatments of **Bifen 7.9F Select**.

Bifen 7.9F Select will not stain or damage any surface that water alone will not stain or damage.

BIFEN 7.9F SELECT™

INSECTICIDE

STORAGE AND DISPOSAL

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

PESTICIDE STORAGE: Keep out of reach of children and animals. Store in original containers only. Store in a cool, dry place and avoid excess heat. Carefully open containers. After partial use replace lids and close tightly. Do not put concentrate or dilute material into food or drink container.

PESTICIDE DISPOSAL: Pesticide wastes are toxic. Do not contaminate water, food, or feed by storage or disposal. Improper disposal of excess pesticide, spray mixture, or rinsate is a violation of Federal Law. Dispose of excess or waste pesticide by use according to label directions, or contact your State Pesticide or Environmental Control Agency, or the Hazardous Waste representative at the nearest EPA Regional Office for guidance.

CONTAINER HANDLING:

[NONREFILLABLE CONTAINERS] Nonrefillable container. Do not reuse or refill this container. Triple rinse container (or equivalent) promptly after emptying.

(Nonrefillable container ≤ 5 gallons): 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 smoke.

(Nonrefillable ≥ 5 gallons): Triple rinse as follows: Empty the remaining contents into application equipment or a mix tank. Fill the container 1/4 full with water. Replace and tighten closures. Tip container on its side and roll it back and forth, ensuring at least one complete revolution, for 30 seconds. Stand the container on its end and tip it back and forth several times. Turn the container over onto its other end and tip it back and forth several times. Empty the rinsate into application equipment or a mix tank or store rinsate for later use or disposal. 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 smoke.

[REFILLABLE CONTAINERS]

Refillable container. Refill this container with pesticide only. Do not reuse this container for any other purpose. Cleaning the container before final disposal is the responsibility of the person disposing of the container. Cleaning before refilling is the responsibility of the refiller. To clean the container before final disposal, empty the remaining contents from this container into application equipment or a mix tank. Fill the container about 10 percent full with water. Agitate vigorously or recirculate water with the pump for 2 minutes. Pour or pump rinsate into application equipment or rinsate collection system. Repeat this rinsing 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 smoke.



BIFEN 7.9F SELECT™

INSECTICIDE

CONDITION 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 must be followed carefully. It is impossible to eliminate all risks inherently associated with the use of this product. Ineffectiveness or other unintended consequences may result because of such factors as manner of use or application, weather, presence of other materials or other influencing factors in the use of the product, which are beyond the control of Albaugh, LLC or Seller. To the extent consistent with applicable law, all such risks shall be assumed by Buyer and User, and Buyer and User agree to hold Albaugh, LLC and Seller harmless for any claims relating to such factors.

Albaugh, LLC warrants that this product conforms to the chemical description on the label and is reasonably fit for the purposes stated in the Directions for Use, subject to the inherent risks referred to above, when used in accordance with directions under normal use conditions. This warranty does not extend to the use of this product contrary to label instructions, or under conditions not reasonably foreseeable to or beyond the control of Seller or Albaugh, LLC, and Buyer and User assume the risk of any such use. TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, ALBAUGH, LLC MAKES NO WARRANTIES OF MERCHANTABILITY OR OF FITNESS FOR A PARTICULAR PURPOSE NOR ANY OTHER EXPRESS OR IMPLIED WARRANTY EXCEPT AS STATED ABOVE.

To the extent consistent with applicable law, neither Albaugh, LLC nor Seller shall be liable for any incidental, consequential or special damages resulting from the use or handling of this product. TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, THE EXCLUSIVE REMEDY OF THE USER OR BUYER, AND THE EXCLUSIVE LIABILITY OF ALBAUGH, LLC AND SELLER FOR ANY AND ALL CLAIMS, LOSSES, INJURIES OR DAMAGES (INCLUDING CLAIMS BASED ON BREACH OF WARRANTY, CONTRACT, NEGLIGENCE, TORT, STRICT LIABILITY OR OTHERWISE) RESULTING FROM THE USE OR HANDLING OF THIS PRODUCT, SHALL BE THE RETURN OF THE PURCHASE PRICE OF THE PRODUCT OR, AT THE ELECTION OF ALBAUGH, LLC OR SELLER, THE REPLACEMENT OF THE PRODUCT.

Albaugh, LLC and Seller offer this product, and Buyer and User accept it, subject to the foregoing Conditions of Sale and Limitation of Warranty and Liability, which may not be modified except by written agreement signed by a duly authorized representative of Albaugh, LLC.

Micro-Injector is a registered trademark of Whitmire Micro-Gen Corp.

Actisol is a registered trademark of Roussel-Uclaf.

This information is for promotional purposes only. Space considerations may require information to be omitted.

Always refer to the actual package for complete label verbiage. This product may not yet be available or approved for sale or use in your area.

Manufactured By: Albaugh, LLC, 1525 NE 36th Street, Ankeny, IA 50021