

gardens

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SOUTH DAKOTA STATE UNIVERSITY® AGRONOMY, HORTICULTURE & PLANT SCIENCE DEPARTMENT

Commonly Available Pesticides for Ornamentals 2021

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The chemicals (active ingredient) and their product trade names are those that are most commonly available in South Dakota and the inclusion of any trade name associated with a chemical shall not be taken as an endorsement nor the exclusion of any trade name as a criticism regarding effectiveness. Not all products listed for a chemical are equally effective for a specific pest. Refer to the label to determine whether a product can be used in a specific situation. **Bold** trade names are products for only commercial applicators. Read and follow all label instructions and the label is the final authority for a product's use on a pest or plant.

Key	Application method
(FS)	Foliage sprayed.
(IN)	Injected into the lower trunk of the tree.
(SO)	Soil application either as soil drench or injection depending on label.
(TS)	Trunk spray, the height dependent on the insect to be managed.
(TS-B)	The lower 2 to 5 feet of the trunk sprayed, height on label.

Insecticides

Chemical name	Trade name
Acephate	Bonide Systemic Insect Control (FS)
	Dendrex (IN)
	Lepitect (IN, SO)
Azadirachtin	Bonide Neem Oil (FS)
	Gordon's Azatrol (FS)
	AzaSol (IN, CS)
Bidrin	Inject-A-Cide B (IN)
Bifenthrin	Hi-Yield Bug Blaster (FS, TS)
	BiFen XTS (TS)
	Onyx Pro (TS)
Carbaryl	Garden Tech Sevin (FS)
	Carbaryl 4L (TS)
	Sevin SL (TS)
	Sevin XLR (TS)
Chlorantraniliprole	Acelepryn (FS)
Dinotefuran	Safari (FS, SO, TS-B)
	Transtect (SO, TS-B)
	Zylam Liquid Systemic Insecticide (SO, TS-B)
Dormant oil ¹	Gordon's Dormant Oil Spray (FS-before bud-break)

Chemical name	Trade name
Emamectin Benozate	ArborMectin (IN)
	Boxer (IN)
	Mectinite (IN)
	Tree-Age (IN)
	TreeMec (IN)
Horticultural oil1	Ferti-Lome Horticultural Oil (FS)
	RTSA Horticultural Oil (FS)
Imidacloprid ²	BioAdvanced Tree and Shrub Insect Control (SO)
	IMA-Jet (IN)
	Imicide (IN)
	Merit (SO)
	Pointer (IN)
	Xytect (SO)
Insecticidal soap	Bonide Insecticidal Soap (FS)
	Ferti-Lome Insecticidal Soap (FS)
	Garden Safe Insecticidal Soap (FS)
	M-Pede (FS)
Malathion	Bonide Malathion (FS)
	Gordon's Malathion (FS)
	Hi-Yield Malathion (FS)
Permethrin	Astro (TS)
	Hi-Yield Lawn, Garden, Pet & Livestock Insect (TS)
	Tengard (FS)
Pyriproxyfen	Distance (FS)
Spinosad	Bonide Captain Jack's Dead Bug Brew (FS)
	Ferti-Lome Spinosad (FS)
	Ortho Insect Killer Tree & Shrub Concentrate (FS)
	Conserve (FS)
Tau-Fluvalinate	BayerAdvanced Insect, Disease & Mite Control ³ (FS)

Miticides⁴

Chemical name	Trade Names
Abamectin	Aracinate (FS)
	Lucid (FS)
Bifenazate	Bifenamite (FS)
Hexythiazox	Hexygon (FS)
Spiromesifen	Forbid (FS)
Tau-Fluvalinate	BayerAdvanced Insect, Disease & Mite Control ³ (FS)

Fungicides

Chemical name	Trade Names
Captan	Bonide Captan (FS)
	Hi-Yield Captan (FS)
Chlorothalonil	Bonide Fung-onil (FS)
	Garden Tech Daconil (FS)
	Pegasus (FS)
Copper	Bonide Copper Fungicide (FS)
	Ferti-Lome Copper Soap Fungicide (FS)
Mancozeb	Junction ⁵ (FS)
	Manzate (FS)
Myclobutanil	Spectracide Immunox Fungicide Spray (FS)
	Myclotect (FS)
Propiconazole	Ferti-Lome Liquid Systemic Fungicide (FS)
	Alamo (IN)
	Shepherd (IN)
	Propizol (IN)
	Quali-Pro Propiconazole (IN)
Tebuconazole	BayerAdvanced Insect, Disease & Mite Control ³ (FS)
Thiabendazole	Arbortect 20-S (IN)
Thiophanate-Methyl	Talaris (FS)
Trifloxystrobin	Compass (FS)

Bactericide

Chemical name	Trade Names
Oxytetracycline	Arbor-OTC (IN)
	Tree Tech OTC (IN)

Nematicide

Chemical name	Trade Name
Abamectin	Aracinate (IN)

¹ May remove the blue coloration from a Colorado spruce.

² Many Imidacloprid labels prohibit application to basswood and linden trees as their flowers are attractive to bees and other pollinators.

³ Contains Tebuconazole and Tau-Fluvalinate.

⁴ There are many other products labelled for mites, but they are for suppression.

⁵ Contains mancozeb and copper.

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