

Henbit

Description

Henbit (*Lamium amplexicaule*) is a sparsely hairy winter annual with greenish to purplish, tender, square stems. Its opposite leaves are broadly egg shaped with bluntly toothed margins and prominent veins on the underside. Upper leaves are sessile (directly attached to the stem) and lower leaves have petioles. It has a fibrous root system and can grow to a height of 16 inches. Henbit's distinctive flowers are reddish purple in color with darker coloring in spots on lower petals. It flowers in the spring with the flowers arranged in whorls in the upper leaves.



Henbit growth habit.

Steve Dewey, Utah State University, Bugwood.org



Top view of henbit's upper leaves and flower buds.

Karen Russ, ©2009 HGIC, Clemson Extension

Henbit is found throughout most of South Carolina. It most commonly occurs in open disturbed sites, often in fields and along roadsides. It is also found in home lawns.



Side view of henbit stems, leaves and flowers.

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Henbit is commonly confused with purple deadnettle (*Lamium purpureum*). However, purple deadnettle has upper leaves that are triangular, occur on petioles, and are distinctly red or purple-tinted, unlike the upper leaves of henbit.



Purple dead nettle with triangular leaves and purple coloration.

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Cultural Control

Henbit is a winter annual, broadleaf weed that reproduces by seed that germinate in the fall or winter. Henbit grows during any period of warm weather that occurs in winter. Other than unusual warm weather periods, it remains somewhat dormant during the winter. Henbit resumes growth and produces seed in the spring and dies as temperatures increase in late spring and early summer.

Henbit can quickly invade thin turf areas especially where there is good soil moisture. Shade also encourages growth. Many have a prostrate growth habit and are not affected by mowing.

A dense, vigorous turf is the best way to reduce the encroachment of henbit. First, select a turfgrass cultivar adapted for your area, and then properly fertilize, mow, and water to encourage dense growth. For more information on growing healthy turfgrass, see [HGIC 1201, *Fertilizing Lawns*](#); [HGIC 1205, *Mowing Lawns*](#); and [HGIC 1207, *Watering Lawns*](#).

In landscape beds, henbit can be hand dug and suppressed with the use of mulch. A 3-inch mulch layer is ideal to reduce weed growth.

Chemical Control

In Lawns: Cultural controls should be implemented before applying herbicides for henbit control. However, after taking steps to modify lawn care techniques, a chemical control may still be necessary to further reduce a henbit population. Herbicides should be carefully chosen according to turf species and all label instructions followed. Chemical controls for henbit should be applied in fall or early spring for best results. Keep in mind that herbicide effectiveness is reduced as weeds mature.

A three-way herbicide may be used on bermudagrass, zoysiagrass, centipedegrass, St. Augustinegrass and tall fescue. The active ingredients of a three-way herbicide include the following broadleaf weed killers: 2,4-D, dicamba, and mecoprop (MCP). Examples of three-way herbicides are Ferti-lome Weed-Out Lawn Weed

Killer with Trimec®, Bayer Advanced Southern Weed Killer for Lawns, Spectracide Weed Stop Weed Killer for Lawns, Southern Ag Lawn Weed Killer with Trimec®, and Lilly Miller Lawn Weed Killer Concentrate.

Note: Herbicides containing 2,4-D should be applied at a reduced rate on St. Augustinegrass and centipedegrass to prevent damage to these lawns. If a second application is needed, apply the herbicide in spot treatments. Repeated applications of a three-way herbicide should be spaced according to label directions.

In addition to three-way herbicides there are several other herbicides that can be used for henbit control on home lawns. Atrazine may be used to control henbit in centipedegrass and St. Augustinegrass.

Metsulfuron (Manor and Blade) can be used for henbit control in bermudagrass, centipedegrass, St. Augustinegrass, and zoysiagrass. Metsulfuron is packaged for landscape professionals. Due to the cost and application rate of this selective herbicide it may be more practical to hire a landscape professional for weed treatment. A non-ionic surfactant (such as Southern Ag Surfactant for Herbicides) is required at 2 teaspoons per gallon of spray mix for best control. Do not apply metsulfuron to lawn if over-seeded with annual ryegrass or overseed for 8 weeks after application. Do not plant woody ornamentals in treated areas for one year after application of metsulfuron. Do not apply metsulfuron herbicides within two times the width of the drip line of desirable hardwood trees.

Note: Read and follow all label instructions when using herbicides. Repeat applications 10 to 14 days apart may be required for acceptable control. Do not mow within 48 hours after application of most herbicides. Most postemergence herbicides need to dry on the leaf surface before irrigation or rainfall occurs.

CAUTION: Herbicides should not be applied during spring transition (green-up of lawn) or when air temperatures exceed 90 °F as this can cause severe damage to the turfgrass. A newly seeded lawn should be mowed a minimum of three times before applying an herbicide.

Turf Tolerance to Herbicides for Henbit Control

Herbicide	Bermudagrass	Centipedegrass	St. Augustinegrass	Tall Fescue	Zoysiagrass
atrazine	D	S	S	NR	NR
(3- way) 2,4-D + MCPP + dicamba	S	I	I	S	S
metsulfuron	S	S	S-I	NR	S
S = Safe at labeled rates I = Intermediate safety, use at reduced rates NR = Not registered for use on and/or damages this turfgrass D = Fully dormant turf only.					

In Landscapes: If henbit is a problem in landscape beds, glyphosate can be used for spot treatments around ornamental plants. Examples of glyphosate products are Roundup Original, Eraser Systemic

Weed & Grass Killer, Quick Kill Grass & Weed Killer, Bonide Kleenup Grass & Weed Killer, Hi-Yield Super Concentrate Killzall Weed & Grass, Maxide Super Concentrate 41% Weed & Grass Killer and Southern States Grass & Weed Killer Concentrate. Glyphosate is a non-selective herbicide that should be used with caution. Do not allow glyphosate spray mist to contact ornamental foliage or stems as severe injury will occur. A cardboard shield may be used to prevent glyphosate spray from drifting to nearby ornamentals.

Prepared by Morgan E. Judy, Extension Agent, Orangeburg County, Clemson University. (New 05/09. Pesticides Updated 09/10.)

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