

# SC WaterWays

answering today's water resource challenges for future generations

## Rain Garden Plants: *Achillea millefolium* - Yarrow

Sarah A. White, Clemson University, and  
Terasa Lott, Clemson Extension Service

February 2016

A rain garden is a shallow vegetated depression designed to capture stormwater runoff and allow the water to soak into the soil and drain into underground water reserves. These gardens function as natural filters that improve water quality, provide wildlife habitat and feature beautiful native, perennial plants. Yarrow (*Achillea millefolium*) is from the daisy (*Asteraceae*) family and is a native plant suited for use in rain gardens. Yarrow is prized for its flowers and is available in a range of colors including white, yellow, and pink (light to rose ) (Figure 1). Yarrow has multiple common names including milfoil, soldiers' woundwort, and bloodwort.

known as "soldiers' woundwort" during the Civil War as it was widely used as a treatment for wounds. Native Americans used tea made from yarrow leaves harvested shortly before bloom to treat earaches, toothaches, and headaches.<sup>3</sup>

Scientists later documented the presence of alkaloids and glycosides, which contribute to the medicinal properties of the plant. Some people are allergic to the foliage or sap from yarrow, so care (gloves, long-sleeved shirt and pants) should be taken when handling the plant to minimize potential for allergic reaction.<sup>4</sup> Extended use of yarrow causes photosensitivity and may interact with prescription medications. Both native, naturalized, and hybridized (native × naturalized, introduced populations) yarrow colonies are prevalent in the United States.

### Benefits

Yarrow flowers provide nectar and habitat for lady-beetles (ladybugs) and butterflies. The Xerces Society (a nonprofit organization that protects wildlife through the conservation of invertebrates and their habitat) recognizes yarrow as having special value to native bees (Figure 2) and to populations of predatory and parasitoid insects, that serve as biological control agents, preying upon pest insect species within the landscape.<sup>5</sup> Yarrow is also deer resistant as the foliage is aromatic and contains alkaloids that generally make the plant less palatable or "tasty." Cultivated yarrow species provide the best form and color in the landscape, as they are less prone to lodging (falling over) than the native species. However, all yarrow, whether cultivated or native, produce excellent cutflowers that can be used in fresh and/or dried arrangements.



Figure 1. Color range of yarrow, both common and cultivated.

### History and Traditions

Yarrow was named after Achilles, the great warrior of Greek mythology who was said to have used the plant for medicinal purposes during the Trojan war. Yarrow was



Figure 2. Native bee foraging on white yarrow blossom.

## Planting and Care

Common yarrow has a native range extending throughout the United States. In natural conditions, yarrow is found in mildly disturbed soils of open grasslands or in open forests. Since yarrow tends to be leggier in part-shade conditions, it should be sited in a full-sun location if a more compact form is desired. The life span of yarrow is short when located in areas that remain wet, due to yarrow's susceptibility to root rot and powdery mildew. Plant longevity and flowering increases if situated in a nutrient poor, dry soil with full sun.

To extend yarrow's survival and persistence in the garden, divide every two to three years and space plants 12 – 18" apart. Common yarrow can be weedy, spreading to other areas within the surrounding landscape; thus, sterile cultivars should be selected to limit the invasive potential. Deadheading (pruning spent flowers) in mid-summer will extend the color show of many cultivars (Figure 3).



Figure 3. Trial of *Achillea millefolium* 'Song Siren Laura' at the Ball Trial Gardens.

**Table 1. Plant preferred site conditions**

<p><b>Light:</b> Full sun to part shade.</p> <p><b>Zones:</b> 4 – 8</p> <p><b>Origin:</b> USA</p> <p><b>Type:</b> Herbaceous Perennial</p> <p><b>Moisture:</b> Very drought tolerant, prefers sites where drainage is adequate and water does not sit for extended time periods.</p> <p><b>Soil:</b> Tolerant of a range of soil conditions, but performs best in well-drained soils. Tolerant of alkaline (high pH) soils.</p>
---

Yarrow is extremely drought resistant once established and will recover from periods of extreme drought. To establish successful plantings, only use in rain gardens where periods of flooding will be short or intermittent, and place yarrow near the gardens' edge to further improve the drainage of the soil.

## Garden Design

Yarrow is a mid-range height herbaceous perennial and performs best as a mid to rear border plant, but does not appear out of place near the front of the bed as long as adequate sunlight and drier soil moisture are maintained (Figure 4). Though hardy in USDA hardiness zones 3 – 9, yarrow performs best in cooler climates, and often melts out during hotter summers in USDA Plant Hardiness Zones 7b – 9. When considering yarrow, utilize cultivars that specifically refer to heat tolerance to gain improved performance in hotter climates.

Yarrow occurs in natural grasslands with big bluestem (*Andropogon gerardii*) and panic grass (*Panicum virgatum*). Other companion plants to consider are listed below.



Figure 4. Landscaped planting featuring yarrow cultivars.

**Table 2. Design considerations - growth habit and plant interest**

**Height & Width:** 1 – 3' h x 1' w

**Spacing:** 1' – 1.5'

**Growth rate:** Slow to moderate.

**Habit:** Mounded, basal rosette, flowers prone to lodging if grown too wet or in part-shade.

**Foliage:** Aromatic foliage forms in a basal rosette that persists year round. New semi-evergreen shoots emerge from central basal rosette yearly from which flowers are produced. Foliage typically a gray-green, but can be more moss green depending up cultivar.

**Flower:** White, yellow, pinkish flat-topped inflorescence.

## Companion Plants

### Perennials:

- Butterfly milkweed (*Asclepias tuberosa*, orange-yellow flowers during summer)
- Smooth penstemon (*Penstemon digitalis*, a white to light pink flowers in early summer)
- Redhot poker lily (*Kniphofia uvaria*, red, orange, or yellow flowers in late spring/early summer, full sun)
- Columbine (*Aquilegia canadensis*, yellow or red flowers in early to mid-spring, part-sun to shade)
- Joe-pye weed (*Eutrochium purpureum*, pink-red flat topped flowers late summer)

### Shrubs:

- Evergreen holly (*Ilex glabra* and/or *Ilex vomitoria*, evergreen foliage, full sun)
- Common winterberry (*Ilex verticillata*, berries in fall and winter, full sun to part shade)
- American beautyberry (*Callicarpa americana*, purple flowers in summer and purple berries in fall, full sun to shade)

### Small trees:

- Ozark witch hazel or witch hazel (*Hamamelis vernalis* and/or *H. virginiana*, red, yellow, or orange flowers in mid- to late-winter or early spring, full sun to part shade)

## Recommended Cultivars

Galaxy Hybrids – cream, yellow, salmon, orange, and mauve flowers borne on strong stems that are more resistant to lodging.

'The Beacon' – rich red flowers with yellow centers on 2-3' stems; performs better in zone 7 than other Galaxy hybrid cultivars.

'Cerise Queen' – one of the oldest cultivars available, stands 1.5' tall and provides drifts of vivid pink (fuchsia or cerise-red) flowers.

'Great Expectation' – primrose yellow flowers on 2' high stems; performs better in zone 7 than other Galaxy hybrid cultivars.

'Lilac Beauty' – lavender flowers borne on 2.5' stalks, provides striking mass of lavender flowers.

'Paprika' – red and yellow flowers arranged on a flattened inflorescence rising from a 2' flower stalk.

'Petra' – a fiery red hybrid, 1.5' tall. Sterile so no danger of spreading by seed in the garden.

'Red Beauty' – rose-red flowers on 2' tall stalks in midsummer.

'Song Siren Laura' – rose-red flowers 1.5' tall stalks, flowers in midsummer.

'White Beauty' – white flowers on 1.5 – 2' stalks, any pleasant white flowering cultivar may be sold under this name, without regard to true origin.

<sup>‡</sup>Clemson University Extension does not promote the use of any herb or medicine without your doctor's knowledge and supervision.

## References:

<sup>1</sup> Armitage, A.M. 2008. *Herbaceous Perennial Plants*. 3rd ed. Stipes Publishing LLC. Chicago.

<sup>2</sup> Floridata. *Achillea millefolium*. [http://www.floridata.com/ref/a/achi\\_mil.cfm](http://www.floridata.com/ref/a/achi_mil.cfm). Accessed 16 December 2011.

<sup>3</sup> Hurteau, Matthew D. and Briggs, Rebecca. 20003. Plant fact sheet for Common Yarrow (*Achillea millefolilium*) USDA-Natural Resources Conservation Service, Norman A. Berg National Plant Meterials Center, Beltsville, MD 20705.

<sup>4</sup> Ehrlich, Steven D. 2014. Yarrow. <http://umm.edu/health/medical/altmed/herb/yarrow> Accessed 4 November 2015.

<sup>5</sup> Lady Bird Johnson Wildflower Center. 2015. *Achillea millefolium* L. [http://www.wildflower.org/plants/result.php?id\\_plant=ACMI2](http://www.wildflower.org/plants/result.php?id_plant=ACMI2) Accessed 4 Nov 2015.

All images: S.A. White.

With appreciation to content reviewers, Rebecca Turk, Moore Farms Botanical Garden, and Dr. Helen Kraus, North Carolina State University  
Executive Editor: Katie Buckley, Extension Associate, Clemson Extension Service.



[www.clemson.edu/public/carolinaclear](http://www.clemson.edu/public/carolinaclear)

Carolina Clear is a program of Clemson University's Public Service Activities. Information is provided by Faculty and Cooperative Extension Agents. Clemson University Cooperative Extension Service offers its programs to people of all ages, regardless of race, color, sex, religion, national origin, disability, political beliefs, sexual orientation, marital or family status and is an equal opportunity employer.