

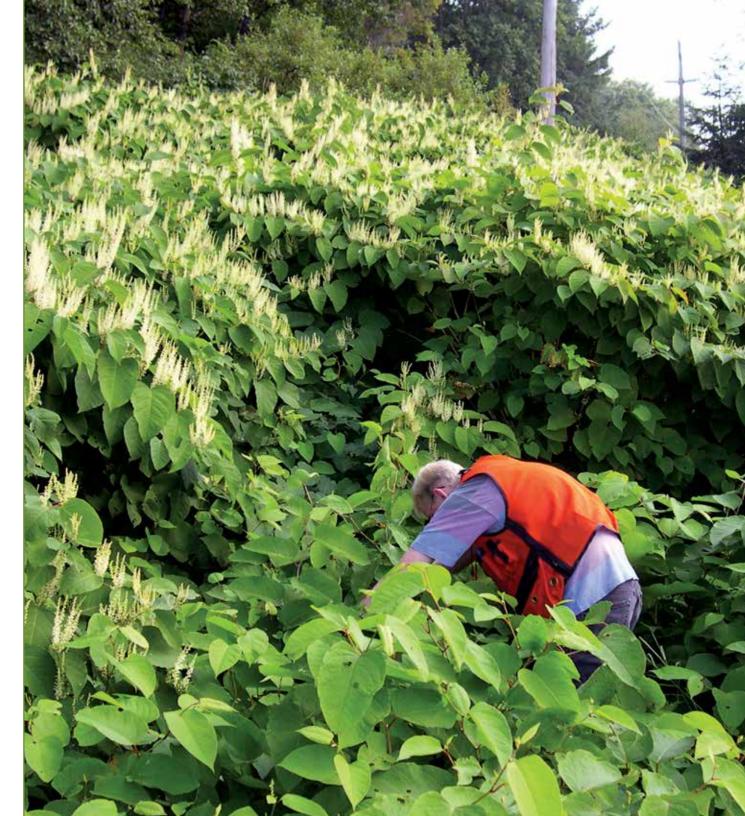




There are many beautiful plants out there that you may think are perfect for your garden. But did you know that many of the most commonly planted are in fact invasive species? Here is a helpful booklet for gardeners or other homeowners that will guide you to a more gorgeous and environmentally friendly yard. The Invasive Species Crew at the Forest County Potawatomi Natural Resources Department has come together to educate the public about the consequences of gardening with invasive plants and what native species you can plant as alternatives.

The 2014 FCPC Invasive Species Crew consists of Mindy McPherson, Samantha Vogel, and Samuel Begay.







Japanese Barberry

CHARACTERISTICS:

Japanese barberry shrubs can reach heights of 6 feet at maturity. Yellow dangling flowers bloom in spring. This shrub is popular in spite of its sharp thorns due to its bright red berries that last well into the cold months and for its reddish-purple foliage.

ECOLOGICAL THREAT:

Japanese barberry escapes from plantings and forms dense stands in natural forests, open woodlands, wetlands, pastures, and meadows. It alters soil moisture and nitrogen levels. When established, barberry displaces native plants and reduces wildlife habitat. White-tailed deer avoid eating barberry, preferring to feed on desirable native plants in a vicious cycle that leads to a growing barberry infestation and reduced wildlife habitat.

 Japanese barberry increases the risk of Lyme disease, as it increases both the number of ticks and the percent of ticks that are infected with the disease.

REMOVAL:

Identification is easiest in early spring because barberry is one of the first shrubs to leaf out, or in the fall and winter when the red berries stand out. Digging and pulling it out in areas where only small amounts of plants are located is the most effective. Shovels or hoes should be used to uproot the bush itself and all its connecting roots.

 When removing barberry, thick gloves are recommended to protect from the plant's thorns.

Japanese Barberry

(Berberis thunbergii) Photo Credit: Dennis Woodland



- Low Bush Blueberry
- High Bush Cranberry
 - Dogwoods





(Vaccinium angustifolium aiton) Photo Credit: Kenneth J. Sytsma



Red Willow/ Red Osier Dogwood

(Cornus stolonifera) Photo Credit: Kenneth J. Sytsma

High-bush Cranberry

 $(\mbox{Viburrum opukus L.}) \\ \mbox{Photo Credit: Matthew L. Wagner}$

Garlic Mustard

CHARACTERISTICS:

Garlic mustard is a cool season plant with stalked, triangular or heart-shaped, toothed leaves that give off the odor of garlic when crushed. In their first year, plants appear as green leaves close to the ground. They remain green through the winter and develop into mature flowering plants in spring. Flowering plants of garlic mustard reach from 2 to 3 feet high and produce clusters of small white flowers, each with four petals in the shape of a cross.

ECOLOGICAL THREAT:

This plant spreads in woodlands and floodplain forests, as well as in disturbed areas such as yards and roadsides. Garlic mustard gives off a chemical in the soil that disrupts connections between beneficial fungi and native plants. This may prevent some of our native plants from growing nearby. At the early stages of infestation the plant gives off high amounts of this chemical. Densely infested lands even alter the habitat for wildlife.

REMOVAL:

Hand pull before it sets seeds in early spring. Cut at the base of plants before any flowers have grown (may have to do this more than once during growing season). When Garlic Mustard is flowering, place it in plastic bags for trash disposal.

Garlic Mustard

(Alliaria petiolata) Photo Credit: Robert H. Read



- Foam Flower
- Wild Blue Phlox



Foam Flower

(Tiarella cordifolia L.) Photo Credit: John Kohout



Wild Blue Phlox
(Phlox divaricata)
Photo Credit: Merel R. Black

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Forget-Me-Not

CHARACTERISTICS:

Leaves are small and alternate; plants can reach up to 12 inches tall. Flowers are sky blue with yellow center; they bloom in May through September.

ECOLOGICAL THREAT:

This diminutive yet pretty plant crowds out natives and forms large monocultures. They can also affect communities by reducing the number of native herbs such as spring wildflowers. This plant is capable of spreading by "runners" and abundant seed production. Extensive seeds that are produced often escape from gardens into woodlands and roadsides.

REMOVAL:

Smaller populations can be hand pulled before seed set (remove entire root system). Put in plastic bag for disposal. Always check back to make sure that new plants aren't emerging.

Forget Me Not

(Myosotis sylvatic) Photo Credit: Richard Bauer



- Wild Blue Phlox
- Wild Geranium





Wild Blue Phlox (Phlox divaricata)

Photo Credit: Merel R. Black



Photo Credit: Christopher Noll



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Dame's Rocket

CHARACTERISTICS:

Flower with four petals and fine hairs on the stem and leaves; color of the flowers range from pink to white or purple. Blooms in late spring through summer. Seeds are produced in long, narrow pods that may grow up to 5" long.

ECOLOGICAL THREAT:

Invades moist woodlands and forest edges; may also extend into roadsides and open areas. When in woodlands it competes with native plants for moisture, light and nutrients. The competition prevents seedling germination and growth. Dame's Rocket can quickly escape from gardens.

Sometimes found in wildflower see mixes; check before purchasing seed mixes

REMOVAL:

Pull plants in early spring. Plants in bloom or seeding should be bagged and disposed of in a landfill.

Dame's Rocket

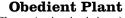
(Hesperis matronalis) Photo Credit: Merel R. Black



- Obedient Plant
- Downy Phlox







(Physostegia virginiana) Photo Credit: Jerry Pavia



Downy Phlox (Phlox Pilosa)

Photo Credit: Merel R. Black

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Japanese Knotweed

CHARACTERISTICS:

Its hollow stem and rings give it the appearance of bamboo, though they are not related at all. Leaves are spade shaped and when young they tend to be more heart shaped. They can be 3-4" wide and 4-6" long. The top of the leaf is a darker green while the bottom is a light green. A small white or green flower may grow off of it in clusters. Roots are white and can be extended deeply into the soil creating a dense impenetrable mat.

ECOLOGICAL THREAT:

Plant contains a chemical toxic to surrounding vegetation. Disrupts nutrient cycling in forested areas and streamside tree regeneration. Japanese Knotweed also increases soil erosion. Small root fragments can re-sprout to form a new invasion.

 Roots are so strong they can crack pavement or the foundation of a home

REMOVAL:

It is possible to eradicate small patches of knotweed with repeated and persistent cutting of the plants. Properly dispose of plant debris in a landfill; fragments as small as a couple inches can re-sprout, producing new infestations. For larger patches, you may have to hire a professional to treat with an herbicide like imazapyr.

Japanese Knotweed

(Fallopia japonica) Photo Credit: Emmet J. Judziewicz







Red Willow/ Red Osier Dogwood

(Cornus stolonifera) Photo Credit: Kenneth J. Sytsma

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Snow on the Mountain

CHARACTERISTICS:

Snow on the mountain is a perennial, growing to a height of 100 cm. The stems are erect, hollow and grooved. The upper leaves are in threes, and are broad and toothed. The plant grows clusters of small white flowers. Once established, Snow on the Mountain is difficult to eradicate. The smallest piece of rhizome left in the ground will quickly form a sturdy new plant. All-green Snow on the Mountain may be more persistent and spread more rapidly than ornamental, variegated (white-edged) Snow on the Mountain varieties, making the all-green type particularly difficult to control. However, all-green, wild forms are known to reappear from seeds of variegated varieties.

ECOLOGICAL THREAT:

Snow on the Mountain is aggressive, forming dense, impenetrable patches that displace native plants and greatly reduce ground layer species diversity. Its colonies also inhibit the establishment of native tree seedlings. Highly shade tolerant, it is capable of invading closed canopy forests.

 Hand weeding is largely unsuccessful because you need to remove all the roots

REMOVAL:

Dig up the entire network of roots, smoother with thick black plastic for a few years, or put in turf grass sod. Snow on the Mountain roots should be dead after three years; however, when returning the area to a planting bed, seedlings may be an issue.

Snow on the Mountain

(Aefopodium podagraia) Photo Credit: Merel R. Black







Wild Sarsaparilla

(Aralia nudicaulis) Photo Credit: Kenneth J. Sytsma

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Periwinkle

Periwinkle plants have slender trailing stems not growing more than 8-30 inches above ground. The

flowers, produced through most of the year, have

leaves are opposite, oval shaped, and evergreen. The

Periwinkle

(Vinca Minor) Photo Credit: Michael Clayton



- Partridge Berry Bearberry







five usually violet (occasionally white) petals joined

CHARACTERISTICS:

ECOLOGICAL THREAT:

together at the base to form a tube.

Periwinkle is frequently found in well-drained, open, disturbed ground of shaded woods, edges and roadsides. Once established, Periwinkle forms a dense carpet to the exclusion of the other plants. This creates a problem where it is competing with native flora. In ideal growth conditions, periwinkle can spread quickly from runners which root at the tips. Dry or cold weather may temporarily set growth back, but it quickly re-sprouts and regains lost ground. It grows most vigorously in the deepest shade and even in poor soil.

REMOVAL:

Pull periwinkle roots when the ground is slightly moist. A hand-held tool can loosen the soil for easier removal. Seal all plant parts in a plastic bag and discard. Cut the Periwinkle with a lawn mower or trimmer as close to the ground as possible and cover with two or three layers of cardboard, thick black plastic or carpet for a few years to smother the Periwinkle to death. Secure the covering in place with heavy objects, stakes, or trenching the edges into the ground. After removing the cover, remove the dead foliage and roots so you can plant a garden

Partridge Berry

(Mitchella repens) Photo Credit: Rob Routledge, Sault College, Bugwood.org

Bearberry (Arctostaphylos uva-ursi)

Photo Credit: Joy Viola, Northeastern University, Bugwood.org

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Here are a few more native plants you may wish to consider



Pagoda Dogwood



Cup Plant



Joe Pye Weed



Basswood

Hazelnut



FOREST COUNTY POTAWATOMI LAND & NATURAL RESOURCES