

THE AG CONNECTION

Steuben County News and Events for Purdue Extension Programs
including Ag & Natural Resources

September 2022



UPCOMING EVENTS

September 22nd - Small Ruminants Lunch-N-Learn Webinar

October 24th - Purdue Extension Annual Meeting, Zollner Hospitality Suite

October 25th - Purdue Extension Fundraiser Event at Culver's

November 1st - Commercial Pesticide Applicator Training, Allen County

November 1st - 3rd - Plain Communities Conference, LaGrange, IN

November TBD - House Plant Series (more to come!)



Find us on Facebook @

<https://www.facebook.com/SteubenCounty>

For more information on these events contact Reba
at the office or check out our Facebook Page!

UPCOMING AG EVENTS



PURDUE EXTENSION

COMMERCIAL PESTICIDE APPLICATOR WORKSHOP

MULTI-CATEGORY PESTICIDE TRAINING

9:00 AM | NOV. 1, 2022

Earn commercial pesticide applicator credits for the following categories
1, 2, 3A, 3B, 4, 5, 6, 7A, 7B, 7D, 8, 11, and RT
Program cost is \$80

INFORMATION AND REGISTRATION AT: bit.ly/pfwcch22



CONNECTING WITH AMISH AND OTHER PLAIN COMMUNITIES

A conference for Extension and
related agency professionals



REGISTER TODAY AT: <https://puext.in/AmishConference>

November 1, 2022 – November 3, 2022

Connecting with Amish and Other Plain Communities:

A Conference for Extension and Related Agency Professionals

Are you new to working in an Amish or Plain Community? Do you seek to learn more about their unique culture and traditions? Are you looking for ideas on more successfully engaging with these communities?

COVER CROPS FOR THE HOME GARDEN

Information summarized by an
article by Stephen Meyers, Rosie
Lerner, and Curt Emanuel,
Extension Professionals

Cover crops are plants grown to improve soil quality or to provide a benefit to the ecosystem. Cover crops are generally not grown with the intent to be harvested. Also known as “green manure,” cover crops can be especially valuable in preparing a new site for gardening or between garden cropping seasons. Although cover cropping is mostly used by farmers, it can be a beneficial practice for home gardeners as well.

There are many benefits to cover crops. Some are very easy to observe; others are more obscure. Consider these benefits to determine if cover cropping in the home garden is right for you.

- Reducing erosion
- Improving soil structure
- Reducing weeds
- Recycling nutrients
- Improving soil fertility
- Providing forage and habitat

Planting dates will vary based on if the cover crop being grown is a cool or warm-season species. Most cover crops are generally sown in late summer or early fall in established gardens, after summer vegetables are harvested. Some cover crops will winter kill. Those that are not winter killed will need to be terminated before spring planting to avoid competing with garden crops.



Warm season cover crops should be planted early enough to allow for maximum vegetative growth. In general, this means approximately two months before a killing frost. Most cool-season cover crop species should be planted by mid-September in Northern Indiana and by the end of September in Southern Indiana.

To prevent cover crops from becoming weeds in your garden, you want to terminate them before they produce mature seeds. Cover crops should be terminated two to four weeks before your anticipated spring planting date. This allows time for allelochemical to leach out of the soil, for insect pests to move out of the area, and for composition of the cover crop. For cool-season cover crops, the easiest approach is to choose species that will reliably winter kill in your area. Oats, oilseed radish, and canola typically will winter kill. But it's best to have a backup plan, especially for mild winters.

For more information and full
Purdue publication visit:

[https://www.extension.purdue.edu/
extmedia/HO/HO-324-W.pdf](https://www.extension.purdue.edu/extmedia/HO/HO-324-W.pdf)

For more Cover Crop information visit:
<https://www.midwestcovercrops.org/>

LANDSCAPING WITH INDIANA NATIVES

By Reba Wicker

Using natives in your landscaping has many benefits, from providing habitat for wildlife to replenishing waterways. Native plants are plant species that have occurred naturally in an area for a long time. Native plants include anything from trees, shrubs, grasses, sedges, annuals and perennials, to ferns and mosses.

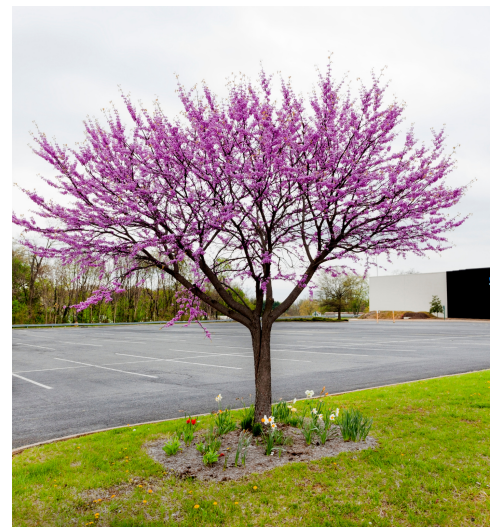
When considering to incorporate natives in your garden its assuring to know that native plants typically require less intensive management because they are already suited for our environment. This could result in less mowing and/or spraying. However, knowing what kind of soil conditions is important to ensure urban environments meet specific native plant needs.

Some benefits to consider when adding natives to your garden include:

- Supports biodiversity
- Provides food for local pollinators
- Provides food and shelter for native wildlife
- Reduces erosion
- Doesn't require much pampering to survive

If you're on the fence about completely changing the landscape, start small and continuously add natives every year.

Native Indiana Trees	Native Indiana Perennials	Native Indiana Shrubs
Red Maple	False Blue Indigo	Ninebark
Eastern Redbud	Purple Conflower	American Cranberry Bush
Swamp White Oak	Joe-pye weed	Arrowwood viburnum



For more information on what native species to plant, talk to the local Soil and Water Conservation District, Natural Resource Conservation Service, Purdue Extension office, and local nurseries about your garden. There are tons of online resources and knowledgeable people in your area!

For more information on natives check out these resources!

<https://indiananativeplants.org/>

<https://steubenswcd.org/backyard-conservation/>

<https://www.extension.purdue.edu/extmedia/ID/ID-464-W.pdf>



Deep Planting and Compaction on Established Trees

Information summarized from a publication by Kyle Daniel, Extension Specialist

When transplanting trees, it is important to consider the long-term viability. Since the typical life span of an urban tree is 7-20 years (USDA), proper establishment techniques are very important to decrease this mortality rate. When a tree becomes established, it is much more difficult to correct below ground problems.

Root deformations can occur for many reasons in established trees, but the most common are due to not making corrections prior to transplanting. Plants that have girdling and circling roots must be addressed at the time of planting. If this issue is not addressed many problems may ensue when the tree is established, which includes decline, tree failure, blow-overs, and more.

Another common problem that occurs at transplanting is deep planting. In the past, plants were often planted deep in the nursery for two main reasons: 1) cold protection of the roots and root flare and 2) prevent the use of staking. In fields that are cultivated, the soil often mounds around the trees which can increase the depth of the root flare. Additionally, when planting into the landscape, trees can be planted too deep, exacerbating the problems associated with planting too deep.



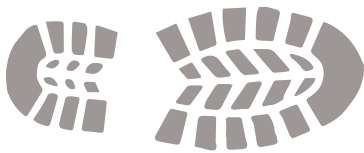
Deep planting can cause an increase in disease, insects, decreased tolerance to flooded soils, adventitious roots, and root circling/girdling. Day and Harris (2008) found that there is significantly more girdled roots at 30 cm below grade than at grade or 15 cm below grade. They also found that excavated trees at 30 cm had more girdling roots than non-excavated roots at 30 cm.

Compaction can become an issue when trees are located in high traffic areas. Compaction will cause a decline in trees over time and become more susceptible to increased insect and disease pressure.

Excavating the root system with a pneumatic digger is a method that can be used to correct all of these problems. Removing soil around the tree will allow root deformations to be located and corrected. Removing the soil around the collar to correct planting depth and girdling roots will increase the longevity of the tree. Compaction can be reduced by using a pneumatic digger to remove the soil from the root hairs that are typically located in the top 6 inches of soil for most trees (Morris, et.al., 2009).

For more information and full Purdue Publication visit:

<https://www.purdue.edu/fnr/extension/deep-planting-and-compaction-on-established-trees/>



information summarized
from publication by
Jeanine Arana and
Stephen Meyers,
Extension Professionals

GIVE THIS WEED THE BOOT!

Giant Ragweed

(*Ambrosia trifida*)



Photo by M. Zimmer

Giant ragweed is a weed member of the sunflower family (Asteraceae) and native to the United States. It is extremely competitive and difficult to control in broadleaf crops. It emerges as early as March and continues to germinate through spring and early summer. Due to this timing, a single control measure is often insufficient for season-long control.

Crop rotation, proper planting dates, and proper chemical selections are essential to control. Herbicide-resistant populations occur in Indiana, so proper research is needed.

for more information :

<https://vegshotline.org/article/giant-ragweed/>

FLOWER POWER



False Blue Indigo

(*Baptisia australis*)

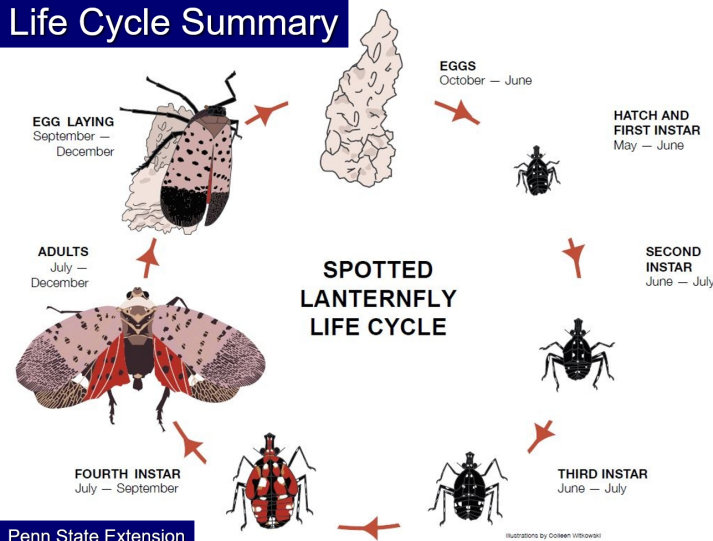
False Blue Indigo is a herbaceous perennial that is native to Indiana. It does well in full sun, where pollinators can enjoy its springtime blooms. Foot-long, lupine-like spires of blue, pea-like flowers are produced in mid to late spring, about a month after the leaves emerge. The color ranges from pale to intense indigo blue, with white cultivars as well. Flowering lasts for just 2-3 weeks. The stems also make a good cut flower. False Blue Indigo grows in bushy clumps, 3-4 feet tall and wide when mature.



Spotted Lanternfly Found in Indiana

Information adapted from IDNR press release by Cliff Sadof, Elizabeth Barnes, and Amy Stone (The Ohio State University)

Life Cycle Summary



Spotted lanternfly (SLF) (*Lycorma delicatula*), a serious invasive plant pest, has been reported in Indiana. This federally regulated invasive species harms plants by slowing their growth and reducing fruit production, especially in vineyards and orchards. Finding this pest this far west of its previously known distribution makes it possible for SLF to be anywhere in Indiana. Knowing where this pest is located can help us respond more effectively.

Spotted lanternfly is a planthopper that originated in Asia. It was first discovered in the United States in Pennsylvania in 2014. The Pennsylvania Department of Agriculture was unable to limit the spread of this pest because it is an effective hitchhiker and is often spread unknowingly by humans.

An adult spotted lanternfly has two sets of wings, and the underwing has a very distinct red color with spots on the outer wings. The fourth instar of the insect is bright red with black and white markings.

Adults and nymphs have piercing-sucking mouthparts and feed on the vascular tissue of leaves, petioles, young shoots, branches and trunks of its hosts. Adults and older nymphs may feed in large populations. This extensive feeding results in oozing wounds on woody tissue and wilting and death of branches.

The spotted lanternfly has a recorded host list of over 100 species, primarily woody species. Their preferred host is tree of heaven (*Ailanthus altissima*) which is a common invasive species in Indiana.

Right now, the Indiana DNR is asking for all citizens to keep an eye out for spotted lanternfly. The bright color of late stage immatures and adults are easily recognized at this time of the year. Anyone who spots signs of the spotted lanternfly should contact the Indiana Division of Entomology and Plant Pathology (DEPP) by calling 866-NO EXOTIC (866-663-9684) or send an email (with a photo of the insect if possible) to DEPP@dnr.IN.gov.

For more information and full publication please visit:

<https://www.in.gov/dnr/entomology/pests-of-concern/spotted-lanternfly/>

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Extension - Steuben County

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