



Newsletter April 2023

Seed Stock Update

Thank you so much to everyone who came out and helped us fill envelopes to restock the seed library! We have most of our core seeds restocked, and more on order. We will be making a substitution for our 3 Sisters with a different type of squash that was not grown locally but was grown historically by Native Americans. It is called Early Yellow Crookneck Squash, and it is a summer squash instead of winter squash. It was donated, along with some other seeds, from the Appleton Seed Library.

Submitted by Melissa, NEW Master Gardener

Calendar of Local Garden Related Events:

April 3, 6-8 pm

Rain Gardens and Pollinator Gardens: Planning, Construction & Native Plants
Virtual (\$)

[Green Thumb Garden Series](#)

April 5, 6:30 - 8 pm: Survival/Necessity Gardens

Located at Green Bay Botanical Gardens (\$)

<https://www.gbbg.org/events/survival-gardens/hi-ju>

April 8, 10 am-4 pm Heritage Hill Spring Fling

Heritage Hill State Historical Park (\$)

[Spring Fling](#)

April 10, 6-8 pm Strawberries, Raspberries and Blueberries

Virtual (\$)

[Green Thumb Garden Series](#)

April 12, 4 weeks until estimated last frost date in Green Bay!

**April 15, 10 - 11:30 am: NEWMGA Insider Info on Peonies
Located at STEM Center, UWGB (\$)**

[Garden Series](#)

**April 17, 6-8 pm Perennials for Sun and Shade April 17
Virtual (\$)**

[Green Thumb Garden Series](#)

**April 17-April 22, library open hours: Earth Day Week Take Home Kit
Central Library (free)**

[Earth Day](#)

**April 17, 6-7:30 pm: Foraging for Food, Health and Wellness
Weyers-Hilliard Library (free)**

[Foraging](#)

**April 19, 6-7:30 pm A Guide to Raised Garden Beds:
Selecting Veggies & Flowers for the Best Productivity
Located at Central library (free)**

[Garden Education](#)

**April 22, 9 am-noon Earth Day at the Kroc
Kroc Center (free)**

<https://www.gbkroccenter.org/events>

**April 22, 1-3 pm: Earth Day Milkweed and Monarchs Workshop
Located at GBBC (\$)**

<https://www.gbbg.org/events/earth-day-milkweed-monarchs-workshop/>

April 26: 2 weeks until estimated last frost date in Green Bay!

**April 26, 6:30-8:30 pm: The Science (and Art) of Plant Disease Diagnosis
Virtual (free)**

<https://pddc.wisc.edu/2023-pddc-plant-disease-talks/>

**April 29: Stem day
Located at STEM Center, UWGB
More info coming soon**

**May 3, noon-1 pm Understanding Your Garden Soil
Virtual (free)**

[Mini Webinars for Gardeners](#)

May 5-7 Garden Blitz (\$)

<https://newleaffoods.org/garden-blitz>

**May 9, noon-12:45 pm: Bee Lawns:
Using your Lawn to Provide Food for Pollinators
Virtual (free)**

[Mini Webinars for Gardeners](#)

NEWMG Plant Sale

**May 11 & 12, 9-5. May 13 th, 9-2
STEM Center on UWGB Campus**

**May 16, 6:30-7:45: Planning & Planting for Seed Saving with Bevin Cohen
Central Library (free)**

[Seed Saving](#)

One Seed, One Community

We are off to a great start. Thank you to the 200 people who already have picked up a packet of seeds with the hope of successfully planting and harvesting the first three pods on each plant. In this issue, you will be warned against three nemesis of the bean plant for this area.

The first nemesis had me baffled. I had acquired a three foot square open-bottomed grow tent that I used in the spring for hardening off plants. One year I decided to get a jumpstart on my bean crop and planted the seeds inside this tent. The warmth of the tent certainly helped the beans sprout early, but when I would check a day or two later, the sprouts would be gone. This is when I discovered I had slugs in my garden. Since then I learned that slugs are very sneaky creatures, and there is lots of misleading information on how to eliminate them. Sprinkling diatomaceous earth, a fine-grained, white, porous, powdery earth, will keep slugs away from your plants, but it needs to be reapplied often. I find that putting a collar around the base of the plant to prevent the slugs from getting to the plants is very effective. An inexpensive way is to use inch tall cardboard tubes. Place these at the time of seeding to

provide protection as the seedling sprouts. Planting beans in pots with purchased soil has also been a solution, but a bit more costly.

The iridescent beauty of the Japanese Beetle quickly disappears if you are a gardener of beans, the second nemesis. The common recommendation to eradicate this beetle is to hand pick it in the morning and evening, when it is slow to move. Every year I start with this method using a jar half-filled with soapy water, but soon it becomes an overwhelming all day job. Knowing insect habits helps to figure out how to outsmart them. These particular beetles fly onto plants. The easiest way to prevent these garden enemies from getting to your plants is to put a covering over the top of the plants. The covering does not need to be tight to the ground, and it can be as simple as pinning old sheer curtains, remnant tulling fabric, netting, or garden row cover fabric to stakes with clothespins. The covering may not be eye appealing, but it does protect the plants for the month or so we are plagued with the beetle.

Like most gardeners, I have a love-hate relationship with rabbits and deer. These are truly beautiful and peaceful creatures to watch, but they do nasty things to my garden when I am sleeping. Although there are repellents you can spray to keep rabbits and deer away, the solution that fits me best is to fence in the plants I want to protect. Since the Dragon Tongue variety is a bush bean, a three foot high fence works for rabbits. By adding a removable top section of fence, it can help keep deer out. Chicken wire is my fence choice. It's inexpensive, removable, easily bends and it is reusable.

Thank you for your interest in the One Seed, One Community Program. Next month's issue will provide you with specific information on planting your seeds. For now, keep your seeds in a cool dry place and be ready to plant after June 1. If you are interested in participating in this program, seed packets are distributed through the Brown County Seed Library located on the second floor of the Brown County library, or email us at seedsaver@newmastergardeners.org.

Submitted by Peggy, NEW Master Gardener

Seed Saving Tips

The March issue discussed what seeds to plant for easy harvesting which included beans, peas, lettuce, tomatoes and peppers. This issue will focus on collecting seeds from these plants.

Deciding what seeds to collect? Look for the healthiest plants to gather your seeds. It is important to allow seeds to reach full maturity before collecting. Tomatoes should be fully ripened, meaning no longer firm. For most peppers, fully ripened means waiting until the pepper turns red. Lettuce is ready when the blossoms have white fluff similar to a dandelion flower. Seeds contained in a pod or husk, like bean and pea, are ready when the husk turns a darker color, are dry to the touch, and the pods crack open easily with pressure.

How do I collect the seeds? Dry seed crops have enclosed seeds in pods or husks and are usually left to dry on the plant. Since the seeds do not fully ripen all on the same day, you can harvest seeds as they ripen, or wait until 60-80 percent of your seeds are ripe and harvest the whole plant. Remove the ripe seed heads (lettuce) or seed pods (beans or peas) and put them on screens or into open containers like box lids or paper grocery bags to dry.

Tomatoes and peppers are considered “wet seed crops”. To harvest, gather the ripest fruits, cut them horizontally in half, and scoop out the seeds with the pulp. This seed mixture from tomatoes is put into a jar with some water and will go through a soaking, fermenting, rinsing and decanting process. Peppers can simply be cut in half, hand pick the seeds, and place on a labeled paper plate or coffee filter to dry.

It is important to label your seeds with the name of the species, variety, and date. For example, Tomato/Brandywine. You may be able to tell seed species apart, but most seed varieties look very much alike.

At this point, seed saving has been fairly easy with choosing self-pollinating plants and allowing fruits or seeds to fully mature before harvesting the seeds. In the next issue, we will explain some different ways to clean the seeds once they have been harvested and talk about plant population.

Submitted by Peggy, NEW Master Gardener

“I want to tell you about the most hopeful thing in the world. It is a seed.”—
Janisse Ray

A Brief Seed Steward Explanation

So what is a Seed Steward, anyway? Well, in our case, a Seed Steward is a person who has received training on seed saving and is saving seeds to

replenish our Brown County Seed Library supplies. Ideally, we would like to have all of our core seeds (seeds we want to carry annually) saved by local Brown County Seed Stewards. Seed Stewards may choose to save as many or as few types of plants as they want, and as many seeds from those plants as they want. Seeds grown locally are better adapted to our climate and do not need to be transported long distances, which ultimately gives us more control over our seed supply and food supply.

Training will be provided by our local association of Master Gardeners, (NEWMGA). It is freely available to anyone who is interested in learning, even if you do not want to commit to being a Seed Steward for the library. If you are interested in becoming a Seed Steward, please go to [Grow With Us](#) to sign up. If you are interested in only Seed Saving training, please email seedsteward@newmastergardeners.org and let us know. Our training program will be available soon. We are excited and proud to be sharing knowledge on seed saving, and we hope to build a whole community of people with these skills.

Submitted by Melissa, NEW Master Gardener

Seed Starting

Don't despair if you haven't started your seeds yet. Many plants that can be started earlier will still thrive if they are started a bit late. The first harvest will likely be a bit later than it could have been or the end product might be smaller, but the plant will still be healthy and produce for you.

If you haven't already, now is the time to get the following seeds started; basil, bergamot, broccoli, brussels sprouts, cabbage, cauliflower, chives, cucumber, dill, echinacea, eggplant, gaillardia, ground cherry, kohlrabi, mustard greens, okra, onion, oregano, peppers, spinach, thyme, tomatillo, tomato and yarrow.

Submitted by Melissa, NEW Master Gardener

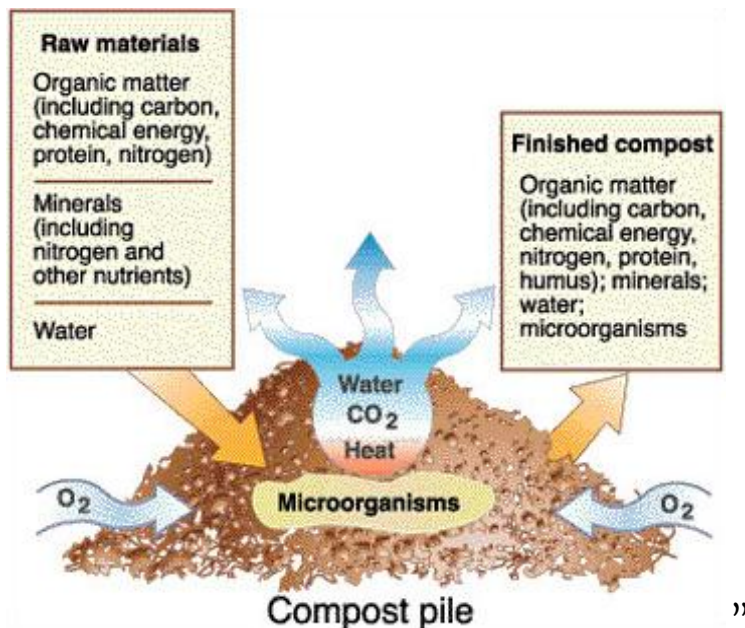
Living Soil and Planning Your No-Till Garden

Last month we talked about basic principles of no-till gardening, the interaction of living soil with our garden plants, and how to set-up a garden bed for no-till, as set forth in Jesse Frost's book "The Living Soil Handbook." This month I would like to talk about compost and its role in stewarding living soil. Compost is a word for the *process* of breaking down organic matter, and also for the end *product* of that process. In this article, the word compost will refer to the product rather than the process.

"Compost is partially decomposed organic matter. It is dark and easily crumbled and has an earthy aroma. It is created by biological processes in which soil-inhabiting organisms break down plant tissue. When decomposition is complete, compost has turned to a dark-brown powdery material called humus. The processes occurring in a compost pile are similar to those that break down organic matter in soil. However, decomposition occurs much more rapidly in the compost pile because the environment can be made ideal for the microbes to do their work (Figure 1).

Figure 1.

A compost pile encourages natural decomposition of organic materials.



<https://extension.missouri.edu/publications/g6956>. This article gives a good explanation of creating your own compost. UW Extension has a good powerpoint with lots of pictures of the process. [MasterComposter](#)

Once compost is added to the garden, it serves many purposes. Jesse Frost breaks it down into 4 different types, based on the purposes it serves. Inoculating composts are finely textured composts that are very biologically

active. These are useful in increasing the number of beneficial microbes in your soil, and even introducing new ones. Vermicompost (worm poop) can be used as an inoculating compost. These composts are typically applied as a tea, a thin layer on the soil or a foliar spray.

Fertilizing compost is a finely textured compost that is high in inorganic nitrogen content. Composted chicken manure is the most commonly available, although manure from rabbits, bats or other small animals may be available for purchase as well. Fresh manure should be allowed to break down for several months before it is used in the garden. It has so much nitrogen that it can “burn” plants or even kill them. If it is not taken up by the plants it can be washed into our water systems, which can cause eutrophication. Read this article to learn more about the nitrogen cycle and eutrophication. [What is the Nitrogen cycle and Why is it Key to Life](#). Fertilizing compost should be used by lightly incorporating a small amount into the top inch of the soil, or by applying on top of the soil and covering with mulch.

Nutritional composts are very balanced composts, providing organic matter, microbiology, nutrients and minerals all at once. This is achieved by incorporating plenty of carbonaceous materials into your compost. “The usual recommended range for Carbon/Nitrogen (C/N) ratios at the start of the composting process is about 30/1... As carbon gets converted to CO₂ the C/N ratio decreases during the composting process, with the ratio of finished compost typically close to 10/1.” [Cornell Compost](#) Because it is not so nitrogen heavy, several inches can be applied to your gardens to feed your plants over time, and the risk of nitrogen runoff is decreased. Most compost that you purchase or create yourself will fall into this category.

Side note: It seems a lot easier for me as a home gardener to accumulate greens (nitrogen) than browns (carbon). Garden waste, grass trimmings and kitchen scraps are all greens and I have a constant supply. Browns are leaves (I get for one month a year), straw (have to buy), paper and sawdust (have to buy). In order to have enough browns during the summer, I have started saving all my junk mail (non glossy paper only) and shredding it. I currently have 5 grocery bags of shredded paper saved up for building compost piles this season. In order to start out with a ratio of $\frac{2}{3}$ browns for every green, I will probably need even more!

The last type of compost is a mulching compost. This type of compost is higher in carbon as compared to other composts. A mulching compost will have a C/N ratio of at least 20/1 at the time it is applied. Often, this is compost that has not completely broken down and will have larger pieces of organic

matter, such as wood chips. Leaf mold and partially composted hay/straw are also common mulching composts. Mulching compost can be applied 4-8 inches thick, and be used as you would typically use mulch around plants. It is important, however, not to confuse mulching compost with mulch. Fresh mulch such as woodchips can cause “nitrogen lock up” because the soil organisms are using all the available nitrogen to consume the carbon in the woodchips, thus depriving the plants growing there of nitrogen. This is why you want to use partially decomposed.

One of the common no-till garden systems is a Deep Compost Mulch System. The garden beds are topped with 4-8 inches of mulching compost (or 4 inches of nutritional compost topped with 2-4 inches of mulching compost) and the compost serves not only as the mulch, but also as the growing medium. You plant directly in your layer of compost. Every growing season you add enough compost to have a 4-8 inch layer on top of the bed. This tends to work better when using transplants instead of direct seeding, especially if the compost does have a lot of larger pieces. If you choose to direct seed, it is better to use a finely sifted nutritional compost topped with a 2 inch layer of mulching compost and plant into the nutritional compost layer.

If it seems like there is a lot to know about compost, it's because there is! But the basic thing to remember is that you are trying to feed the microbiome in your soil. Balance is best so when in doubt use a nutritional compost, and monitor how your soil and plants respond. Ultimately, the use of compost should replace all the nutrients in your soil that are used up with growing your plants. This represents a closed loop system, and is also known as sustainable agriculture.

Submitted by Melissa, NEW Master Gardener

Featured Local Organization: Green Bay Conservation Corps

Established in September 2022, the Green Bay Conservation Corps (GBCC) is an AmeriCorps program run through the City of Green Bay to improve and enhance the parks, trails, and greenways. The GBCC completes habitat restoration projects, manages a greenhouse, collects native seed, installs native plantings, maintains the trail systems throughout the City, conducts habitat mapping and species surveys, and organizes community events. Currently, the GBCC is comprised of six full-time members and is hiring for fifteen summer positions. Members receive a monthly living allowance,

on-the-job training, and a Segal education award after completion of their term. No experience is needed, and members only need to be 17+ years old. In addition to member opportunities, the Conservation Corps welcomes individual or group volunteer days. To learn more and stay up to date with all the events, subscribe to the GBCC [Newsletter](#), visit the [website](#), or follow the GBCC on social media.

Submitted by Maria, GBCC

Plant Profile: Bergamot

Wild Bergamot (*Monarda fistulosa*)



What's all the buzz about with wild bergamot? Besides its fun common names of "horsemint" and "beebalm" (said named because it attracts bees and was once used to treat bee stings), it's medicinally been used for centuries by Native Americans. With there being many varieties of bergamot, we're going to focus on this bumbling beauty.

Native to North America, wild Bergamot is a member of the mint family (Lamiaceae). It shows off its resemblance with its jagged, toothed leaves and has a distinctive fragrance more characteristic to thyme than mint. As an herb, the entire plant can be dried and steeped in hot water for a soothing tea. It's been used to help treat colds and bronchial difficulties said to be due to the presence of a naturally occurring compound called thymol, which acts as an antiseptic.

Wild Bergamot is a perennial that loves full sun (6 or more hours/day) but will also thrive in partial shade. It grows about 2'-4' tall and blooms beautiful lilac-colored flowers from June through September. It's a deciduous plant that spreads by seed and underground rhizomes allowing it to be quite adaptable. Being very susceptible to powdery mildew, spacing your plants 1.5'-2' apart is ideal to allow for plenty of airflow. Soil conditions are usually clay, loamy and can tolerate dry conditions. You'll find it growing in woodlands, meadows and fields. Oh my!

It's no wonder wild bergamot is a favorite among wild-flower lovers. It's a great addition to any landscape for its beauty as well as its attractiveness to many of our hard-working pollinators (bees, hummingbirds and butterflies) for food. As a medicinal and culinary herb, it plays a role in health and nutrition. For each of these reasons, wild bergamot is worth "buzzing" about.

Davis, G. (2022, May 22). Wild Bergamot Is Medicinal and Edible. Lost In The Ozarks. <https://lostintheozarks.com/wild-bergamot>

Buckle, J. (2016). Clinical Aromatherapy: Essential Oils in Healthcare. Elsevier Ltd.

Wisconsin Pollinators. (n.d.). Bergamot: *Monarda fistulosa*. https://wisconsinpollinators.com/Plants/P_Details.aspx?plantid=100

Monarda fistulosa. (n.d.). North Carolina Extension Gardener Plant Box. <https://plants.ces.ncsu.edu/plants/monarda-fistulosa/#:~:text=Monarda%20fistulosa%2C%20commonly%20called%20wild,to%202%2D4'%20tal>

Submitted by Michelle, NEW Master Gardener

Featured Recipe

Very Berry Quinoa Salad with Cinnamon Toasted Pecans

Originally from "The Meatless Monday Family Cookbook"

For the Quinoa:

- 1 c dry quinoa, rinsed well with cold water
- 1 1/4 c water

For the Cinnamon Toasted Pecans:

- 1 1/2 TBSP pure maple syrup
- 1 TBSP brown sugar
- 1/2 tsp ground cinnamon
- Pinch of salt



- 1 c pecan halves
- 1 tsp coconut oil

For the dressing:

- 3 TBSP Dijon mustard
- 2 TBSP maple syrup
- 2 TBSP apple cider vinegar
- 1/2 tsp salt
- 1/2 c extra virgin olive oil

For the Salad:

- 6 cups mixed baby salad greens
- 2 cups mixed berries

Instructions:

For the Quinoa: Combine the quinoa and water in a small pot and bring to a boil. Cover, reduce heat to medium-low and simmer for 12-15 minutes or until the quinoa is tender and the liquid is absorbed. Fluff with a fork.

For the Cinnamon Toasted Pecans: Line a large plate with parchment paper and set aside. In a small bowl, whisk together maple syrup, sugar, cinnamon and salt. Add the pecans and stir to coat evenly.

Heat the coconut oil in a nonstick skillet over medium heat. Pour the pecans in the skillet, spreading them out in an even layer. Cook for 4-5 minutes, stirring frequently, until toasted. Nuts can burn quickly, so don't walk away at this point! You'll know the pecans are done when you start to smell them. Pour them out onto the parchment lined plate and spread out in an even layer. Let cool; they will crisp as they cool.

For the Dressing: Whisk all ingredients together in a small bowl.

For the Salad: Combine salad greens, berries, quinoa and pecans in a bowl; mix well. Divide into 4 servings and drizzle with dressing.

Submitted by Terri, NEW Master Gardener