Green Thoughts

Conversations and ideas about growing at The Spring Gardens

Welcome 2020. Let's hope it's a great growing year. At the Spring Gardens, before there are crocuses and rosebuds and robins on

Carrots?

the wing, the great harbingers of spring are the sign-ups for plots and

Spinach?

the arrival of plant catalogues. Reminder, there are 4 days to sign-up for your plot in February:

Saturdays, 8 Feb and 22 Feb, 2 - 5 PM at LifeSport;

Mondays 10 Feb and 17 Feb 6 - 9 PM at Urban Saloon;

Both locations are on the 2100 block of Fairmount Avenue

Members should get emails soon which will contain agreement and waiver forms for 2020. If you print the forms and fill them out beforehand you'll get through the sign-up more quickly.

Catalogues

The plant/seed catalogues arrive at my door step in the gray of winter. I always enjoy looking at the Burpee's offerings. Its annual catalogue is beautifully put together. The colors are vivid and the composition just right. The rhetoric is enticing. However, their seeds tend to be pricey. So when it comes to buying seeds I turn to purveyors with more washed-out looking catalogues. Just so long as the seeds are fresh, they don't coat the seeds with pesticides or herbicides, they have a reasonable variety of seed types, the prices are moderate and the seeds arrive soon after you order, then that's okay with me. For the last several years I have been ordering seeds from J.W. Jung. So far, so good.

Please let us know what your favorite catalogues are. I'm sure I am missing a lot.

We next turn our attention to advice for growing two crops that have been problematic, at least for some of us.

Growing carrots

by Spring Gardener Linda H.

Carrots and beets always seem like such easy veggies to grow. I'd see other plots with flourishing rows of green tops. I enrich the dirt in my plot every year. I rotate the crops I plant annually. My tomatoes, beans, peas all do great. But year after year my carrot and beet seeds barely germinate, much less give me any produce. Why?

The Case for Sifting Soil

I read a bit on-line and took to heart the description of the best soil for root vegetables being loamy or sandy. All the good manure and enriched top soil I've been adding so diligently actually was probably part of the reason for my plants failing. The soil may be rich but it's also dense and clumpy. There seemed to be two alternatives to fixing my dirt problem; add sand or sift.

Either method was going to require digging up the dirt to a depth sufficient to let the carrots grow unimpeded. Because I didn't know how other plants in my plot would be affected by a sandy soil, I opted for sifting. I shoveled out the dirt from the area where the carrots and beets were to be planted, digging down about 8 inches. As I dug the dirt out it went into a wheelbarrow through a screen I borrowed from the compost bins. When the dig-out was finished the dirt was tipped it back into the plot.

I planted the seeds in exactly the same way as in the past and watered in the same way. I kept the seeds moist until they germinated. Same steps as in previous years with a very different outcome. I had nearly 100% germination and weeks later at harvest the carrots were long and smooth and the beets beautifully formed.

I'm a convert to sifting. Fingers crossed, I'll get another great crop this season.

Cheers,

Linda

Germination and its discontents

I have been growing spinach for many years. As I wrote in an earlier Green Thoughts issue, my success has been spotty. As with Linda's problems (above) it starts with germination. To get a quick start on any of my non-spinach seeds I keep them indoors and put them between damp paper towels and surround them with plastic wrap. That works reliably for most varieties of plants. Broccoli. tomatoes, basil, beans, peas, squash, you name it. The technique works well with varieties that have big seeds, or medium size seeds or small seeds. Ditto cold weather varieties or warm weather varieties. I grow them until I see a rootlet emerging and then transplant the seeds to pots. When they get true leaves and the weather is cooperating I put them outdoors in our plot. No mysteries there. But spinach had me stumped. If I put spinach seeds between damp paper towels and waited until they sprout, I didn't get a root at one end of each seed, instead, I get a gelatinous mass that deteriorated into irreversible goo. Last fall was no different. So I tried something new. I put the spinach seeds between damp paper towels for only a day and then potted the seeds. Then I was distracted by other more pressing matters and completely forgot about the pots as they sat in an obscure corner of our house. I didn't water them, didn't even place them next to a window. Three weeks later I came upon the pots and made a surprising discovery.

Epiphanies are rare and should be cherished. Galileo made his own telescope, looked up at Jupiter over several nights and found its moons revolved around the larger orb. Darwin saw that finches on nearby islands have beaks with sizes and shapes unique to each island. Marie Curie measured electric fields around chunks of uranium ore. Gregor Mendel grew peas and looked at the color of their flowers and their off-springs' flowers and noted what happens when he crossed peas with flowers of different colors. Isaac Newton got bonked on the head with a falling apple that left a lasting impression. And old Archimedes took a bath, saw the water level rise and jumped up and shouted "*Eureka!*"

Galileo realized that our sun's planets must be going around the sun as Jupiter's moons are going around Jupiter (I still tear up when I look through a telescope and see Jupiter and its Galilean moons). Darwin reasoned that those finches demonstrated natural selection and evolution. Marie Curie discovered new elements co-habiting with uranium. Mendel worked out the rules of inheritance and genetics. Newton figured out the law of gravity (Richard Feynman said the Law of Gravitation is the "greatest generalization achieved by the human mind"). And Archimedes finally understood buoyancy. Epiphanies all.

Back to the pots of spinach seeds. Despite my malfeasance and three weeks of neglect, the pots contained spinach seedlings. They were pointing straight up, not bending towards the window. They had green leaves. They hadn't dried out though the soil seemed bone dry. How had they managed to survive and grow? And that is where my epiphany came in - agreed, it's not equivalent to the discovery of a heliocentric solar system, or natural selection or gravity or the rules of inheritance or how things sink and float – but it's something. I had been over-watering newly planted (or newly germinated) spinach In the past I succeeded seeds forever. sometimes despite my worst efforts, because the environment around the seeds dried out. Spinach seeds need to absorb a little water to get going but after that they can germinate on their own, thank you very much. They are different from most other seeds that are tolerant of water.

A beautiful theory in science or gardening can be slain by an ugly fact. So I had to test if this spinach idea would hold up. I put spinach seeds between paper towels, dampened the towels, covered them with plastic wrap and let them go for only one day or two. Then I removed the plastic wrap and let the towels, with spinach seeds in place, dry out overnight. Without adding any more water I covered the towels again with plastic wrap and waited. Within a week I had around 70% germination rate. The seeds had roots and shoots with seed leaves. They were transferred to pots, watered minimally and subsequently planted in my plot. I am confident that they will do well this spring. There are many more experiments to do but this is a start. I always wondered why spinach should be planted in sandy soil. That is probably because water drains easily from sandy soil. Once the spinach plant gets bigger its water aversion probably changes. Keep posted. We'll learn more in the future. Also, there must be other plant varieties with seeds that are shy around too much water. If you know, please contact Green Thoughts.

<u>Salt Hay</u> When you sign up for your plot I suggest you also order a bale of salt hay. It is a wonderful mulch for keeping down weeds and preventing the soil around your plants from baking. This year it is \$13/bale.

<u>Compost</u> Spring is when people remove "dead" material – old dried out plants - from their plots. They put the material in brown bags and cart them off. This stuff is an organic goldmine. Please think about digging a little hole in the corner of your plot, cutting up and putting the dried material in the hole and putting top soil on top of that. If you water regularly it will turn into terrific compost. Please send your ideas, thoughts, suggestions and observations to: <u>e.gruberg@temple.edu</u> that address can also be used for getting on the mailing list for Green Thoughts, or getting off.

Prepared by Ed Gruberg

Back issues of Green Thoughts will eventually be found on The Spring Gardens Website