



Trees, animals, birds, plants, forests, mountains, lakes and rivers — everything that exists in Nature are in desperate need of our kindness, of the compassionate care and protection of human beings. If we protect them, they in turn will protect us.

- Amma

Contents

PNW Gardening

[Powerhouse Pollinator Plants](#)
[Cucumbers: Homegrown Food](#)
[What About Growing Citrus in PNW?](#)
[The Wild Garden](#)
[Photos from Our Reader's Gardens](#)

Nature

[Wild Flowers on Mt. Rainier](#)
[Trust](#)
[The Beauty of Chinese Lantern Pods](#)
[What's Your Guess?](#)

PNW Litter Project

[Stats](#)

Interesting Information from our Readers

Answer Key



GreenFriends is a global grassroots environmental movement which promotes environmental awareness and local participation in conservation efforts throughout the world.

GreenFriends is one of the projects of [Embracing the World](#), a not-for-profit international collective of charities founded by internationally known spiritual and humanitarian leader, Mata Amritanandamayi (Amma)

To join the Pacific Northwest GreenFriends Litter Project, write Karuna at karunap108@comcast.net

Gardening

Powerhouse Pollinator Plants

by Leonard Perry, UVM Horticulturist and Charlie Nardozzi, Garden Consultant



With declines in bee populations from various causes, reduced monarch butterfly populations, bat population declines, and an increasing awareness of the importance of these pollinators to the food we eat, many gardeners are putting in pollinator gardens or adapting existing landscape to be pollinator-friendly. This can be as simple as planting a small grouping of a flower, shrub, or tree attractive to pollinators.

Many garden-related organizations are collaborating on this topic through the National Pollinator Garden Network. Founded in Fall 2014, they aim “to help restore critical pollinator populations in support of the President’s Executive Strategy to Promote the Health of Honey Bees and Other Pollinators.” Through the Million Pollinator Garden Challenge (millionpollinatorgardens.org), they are trying to register a million public and private gardens and landscapes to support pollinators. At the Pollinator Partnership website (share.pollinator.org), you can register your garden or planting.

In addition to plants that provide nectar and pollen, you should provide a water source, sunny areas if possible with windbreaks, and minimal or no use of pesticides. When choosing plants, you should include native plants as they are often best adapted to our native pollinators. Make sure not to choose invasive species. Plan for blooms throughout

Gardening

the growing season. Plant a grouping of several of a particular plant, as groupings are more attractive to pollinators than just one or a few plants.

With all the interest in pollinators, there are an increasing number of research projects on pollinators, as well as resources. One of the most extensive listings, and information, searchable by region of the country, is from the Xerces Society (www.xerces.org) under their Pollinator Conservation Resource Center web page. You also can buy their book from Storey Publishing on *Attracting Native Pollinators*, which covers the pollinators, plants, and considerations for various landscapes and habitats. Another resource that I find useful, filled with facts, lists and photos, is the paperback by Heather Holm, *Pollinators of Native Plants*.

The Pollinator Partnership website already mentioned (pollinator.org) has extensive plant lists and 24-page leaflets (which you can download as pdf files for free) for each of 34 eco-regions of the United States and Canada. You can find your region easily by zip code. Each of these leaflets gives information on plant traits, the pollinators you'll find and support there and what flower features they prefer, plantings and habitats for various locations such as farms and homes, and plant lists with flower bloom times to aid in planning for continuous blooms.

For instance, my part of northern Vermont falls in the Laurentian mixed forest ecological province. For this region, some of the trees and shrubs the Pollinator Partnership lists for May and June blooms are downy serviceberry (white flowers), chokecherry (white), and American basswood (yellow).



Gardening

A couple of large shrubs for later bloom are the bunchberry dogwood (white) and staghorn sumac (yellow green).

American witchhazel is a shrub with fall blooms (yellow). Other native trees you might consider for pollinator habitat enhancement, such as serving as larval hosts, are birches, American beech, and both white and red oaks.

Some shrubs recommended for pollinators by the Xerces Society include highbush blueberry (white or pink flowers) and pussy willow (yellow or green) for early bloom. Among those for mid-season are ninebark (white) and New Jersey tea (white). For late season consider buttonbush both for flowers (white) and as a larval host.

Black locust is a good example of a native plant that bees love, is gorgeous in bloom, and that you may find recommended, but that also may be invasive outside of its native range. Found growing naturally in parts of the southeastern states, it is planted and found naturalized in most other states. Particularly in several northeastern and Midwest states, and along the west coast, it is considered by many as invasive—displacing native vegetation. This particularly is a problem in prairies and savannas.

For perennials in this Laurentian province, the Pollinator Partnership lists a couple dozen. Really early, when little else is out, is the marsh marigold (yellow), particularly adapted as its name indicates to wet areas. Other early perennials are the wild sweet William phlox (pink to lavender), wild geranium (pink), and the Canada white violet (white with streaking). For late spring and early summer, choices include red columbine (red and yellow), harebell (blue), water avens (purplish red), blue flag iris (blue purple), narrow-leaf blue-eyed grass (blue purple), red trillium (red), and golden zizia (yellow).

For summer, perennial choices for pollinators include turtlehead (white), flat-topped aster (white and yellow), Joe-pye (lavender pink) and boneset (white), swamp milkweed (pink), wild bergamot (lavender pink to violet blue), beardstongue (white), obedient plant (pale to dark pink), cardinal flower (red), and the common native black-eyed Susan (yellow, dark brown center).

For late blooms, choices include the calico aster (white and pink), New England aster (purple), and goldenrods (yellow). In a Delaware study by author and entomologist Doug Tallamy on best bets to attract moths and butterflies (www.bringingnaturehome.net), goldenrod attracted the most species (115) with asters a close second (112).

Gardening

In another study, this one at the University of Vermont, graduate student Annie White has collected data on the attractiveness of native species to pollinators, compared to cultivar selections of these species (“nativars”). Of the 13 pairs of plants she compared, seven of the native cultivars attracted significantly fewer bee pollinators than the species. These were ‘Strawberry Seduction’ yarrow, ‘Corbett’ columbine, ‘Twilite Prairie Blues’ baptisia, three cone-flower cultivars (‘Sunrise Big Sky’, ‘Pink Double Delight’, and ‘White Swan’), ‘Moerheim Beauty’ Helen’s flower, ‘Alma Poetschke’ New England aster, and ‘Red Grape’ spiderwort.

The five pairs in which there was no difference in bee attraction included ‘Golden Jubilee’ anise hyssop, ‘Hello Yellow’ milkweed, ‘Fried Green Tomatoes’ cardinal flower, ‘Husker Red’ penstemon, and ‘Claire Grace’ bee balm. ‘Lavender Towers’ Culver’s root attracted more bees than the species.

The message so far from Annie’s research (pollinatorgardens.org) is that bee preference for cultivar or species will vary with the plant but, in general, native species are a better bet. If you can’t find native species, cultivars of flowers are usually better than none. Future research may show that many of our introduced non-native flowers also are useful for pollinators.

If all these lists and research results seem a bit overwhelming, you might start with Annie’s ten top plants. These are herbaceous perennials that are native to the Northeast, attract a diversity of pollinator species, and perform well and look good in home landscapes. They are the blue giant hyssop, purple coneflower, trumpet honeysuckle, sundial lupine, Helen’s flower, Culver’s root, foxglove beardtongue, Joe-pye, New England aster, and wild bergamot.

<https://perrysperennials.wordpress.com/2016/07/11/powerhouse-pollinator-plants>

Articles on pollinators specific to the Pacific Northwest:

[Pollinator Conservation Resources – Pacific Northwest Region](#)

[Pacific Northwest Plants for Native Bees](#)

[Selecting Plants for Pollinators in the Pacific ... - Pollinator Partnership](#)

[12 plants to entice pollinators to your garden](#)

PNW Gardening

Cucumbers: Homegrown food no matter how you eat them



Cucumbers make the best spontaneous summer in-the-garden food I know of. Requiring little in terms of preparation, somehow cool and cooling even when picked on the hottest day, cucumbers define for me "summer." I eat them young, and daily. Our 3-year-old likes little that is green—it is one of those things that FATE does to one. I want nothing more than for her to eat green things, and she wants only a cheese sandwich (i.e., one piece of yellow cheese sandwiched in between 2 pieces of white cheese). However, it would appear that her body knows what is good for it, and this is what happened to a cucumber I left enticingly balanced at her place in table. I complain not!

<https://www.facebook.com/Strictly-Medicinal-Seeds-348837717347>



PNW Gardening

What About Growing Citrus in the PNW? by Lin Rose



Photo - <http://www.learn2grow.com>

When I read on [Karuna's blog](#) about her efforts to keep her little lemon tree alive, I hurried to the web for information on how to succeed with that undertaking.

Karuna's Lemon Tree



PNW Gardening

I found that the Pacific Northwest climate isn't quite mild enough for growing citrus crops year-round outdoors. Nevertheless, it IS possible to grow citrus in pots here. Meyer lemons and Kaffir limes are among popular and hardy varieties.

Portland Nursery has easy to understand information about growing citrus in containers while they're outside during the growing season and inside while it's wet and cold. <http://portlandnursery.com/docs/fruits/Citrus.pdf>

The bare minimum of care is as follows:

- OUTSIDE: full sun at least 8 hours a day with moist but not soggy soil and adequate drainage. I can't imagine how a citrus tree would have fared during this summer's many gray days.
- INSIDE: a bright south-facing window or grow light. I suspect this could be the trickiest requirement to manage to the tree's satisfaction.

More information can be found on YouTube: <https://www.youtube.com/watch?v=R5qV42sAA3A>



PNW Gardening

The Wild Garden by Vandita (Halfmoon Bay, B.C.)



This year I discovered there is something beautiful about a wild garden. Some things went to seed. Weeds grew. Plants got tangled. It's not at all like the usual garden my husband sows and tends.

Good intentions

It started out well. He built flower beds and cleaned up last year's plot. But then his work got busy. With me tending our three-year-old, neither of us had time to supervise seedlings. June rains were the last straw: a wild garden was on the way.

The bees loved the wild garden!

They buzzed among the flowers with wasps and butterflies and other insects. With all this wildness, maybe we'll get less produce. But maybe not. Perhaps a natural balance has emerged, in the quote below. (The quote was adapted and extracted by [Lois Stahl](#) from the book – The One-Straw Revolution by Masanobu Fukuoka.) See what you think.

PNW Gardening

Upon investigation, my garden seemed to have just as many insects as in the surrounding fields, which had been sprayed countless times with a variety of deadly chemicals. But the populations of harmful insects were a lot less in my garden, and beneficial (predatory) insects were present in far higher numbers. I realized that my garden was being maintained in this state by means of a natural balance established among the various insect communities. If my methods were generally adopted, the problem of crop devastation by leafhoppers could be solved.

Inspiration

I'll leave you with some photos that might inspire you to let your garden go a little wild.

Om Namah Shivaya! (Photos By Sophie Smith)



PNW Gardening



PNW Gardening

Photos from Our Readers' Gardens

From Shobana Nuland in Shoreline:



PNW Gardening

From Julie Pigott on Whidbey Island:



Garden Shed, strawberry patch & peach tree



"Frost Peach" Tree



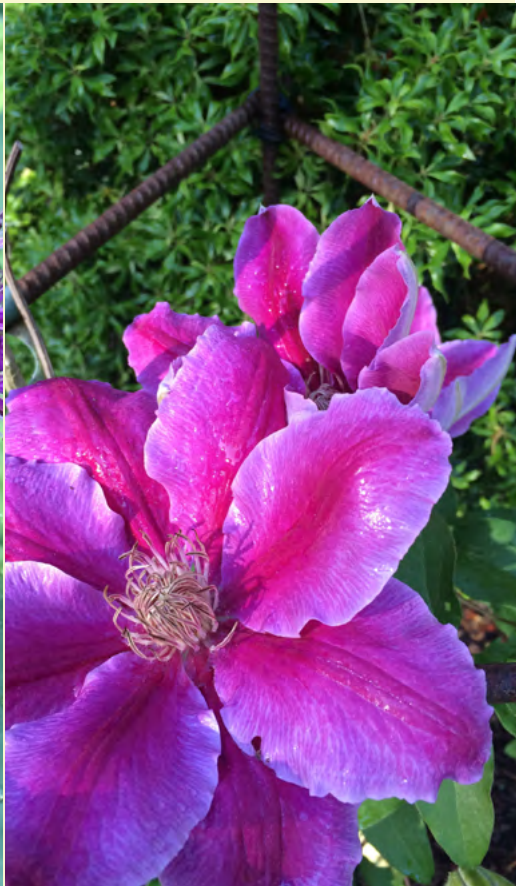
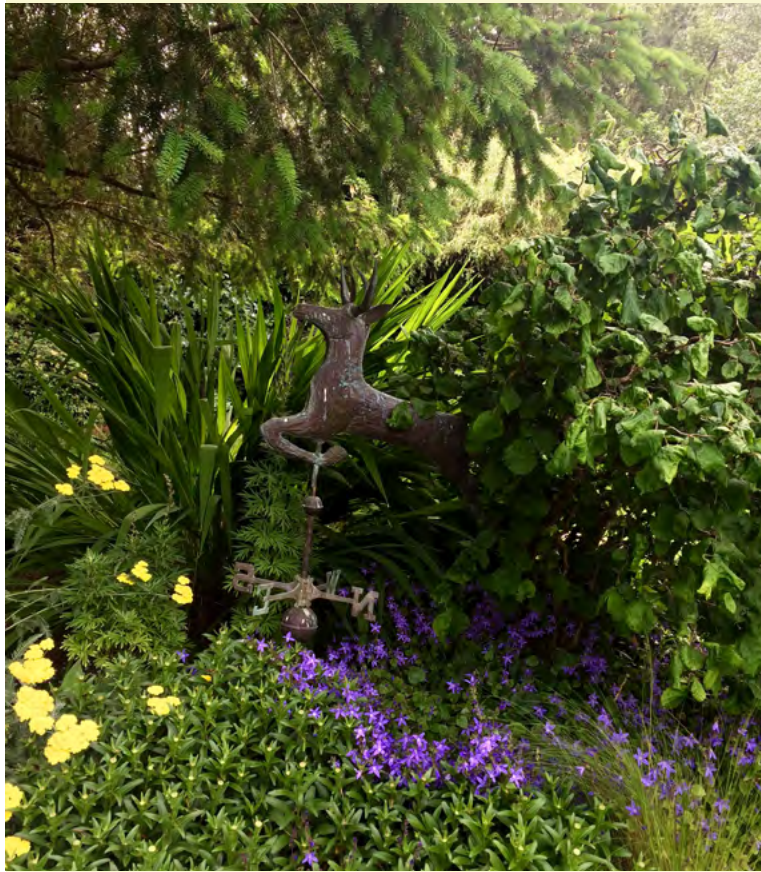
Roses, Raspberries & Poppy pods



Winter squash & Perennial sunflowers

PNW Gardening

From Nika on Bainbridge Island:

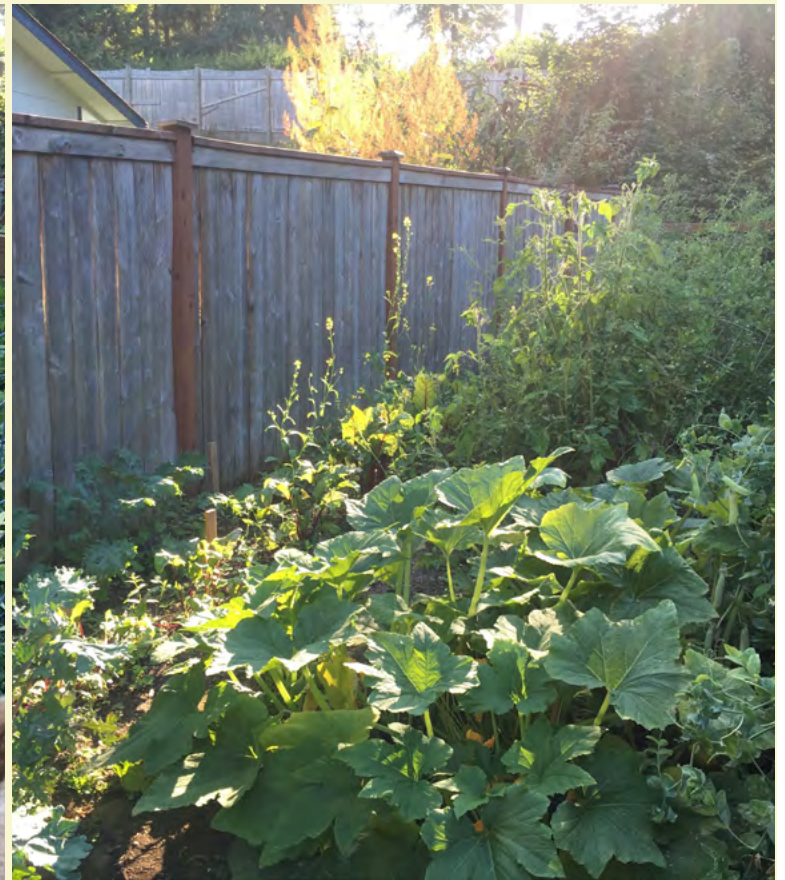


PNW Gardening



PNW Gardening

From Ajayya Godsey in Olympia:



PNW Gardening

From Ananya in Seattle:



Herb container garden with parsley, purple sage, and thyme



Jerusalem Artichoke



Basil Harvest



Rose

PNW Gardening



Italian Plum

Garden spiders abound



PNW Gardening

The Maltby Garden- August 2016



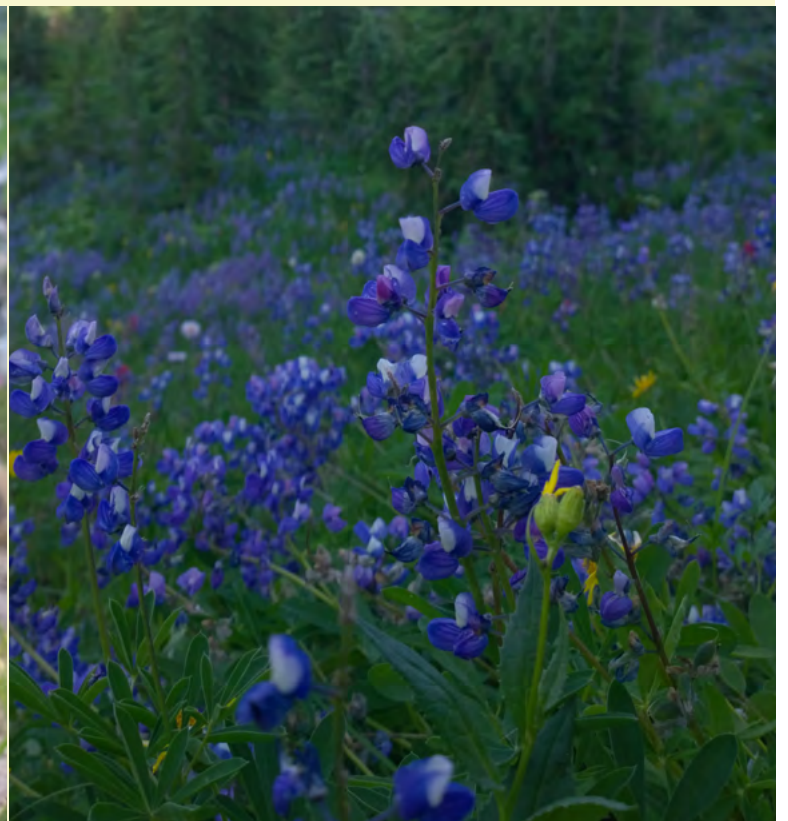
PNW Gardening



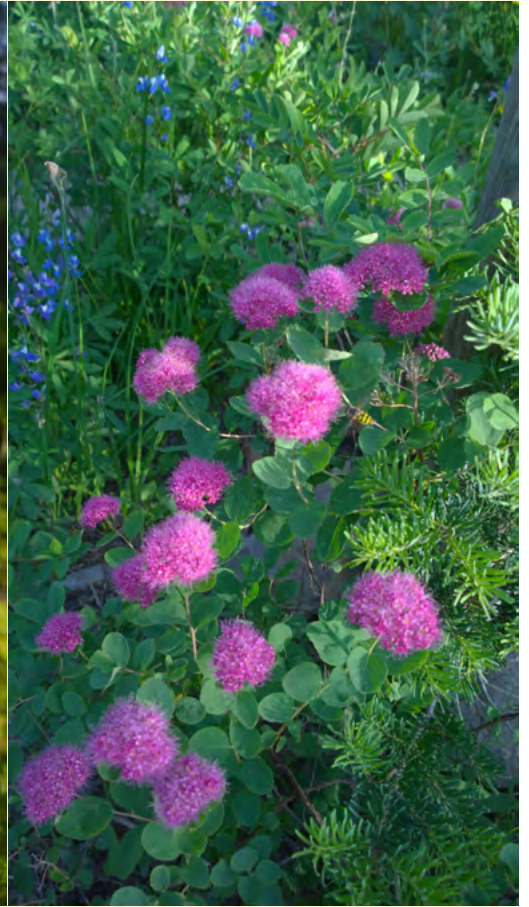
Nature

Wild Flowers on Mt. Rainier by Kothai

While hiking on a section of the Pacific Crest Trail on Mt. Rainier in mid August, i stumbled across this 'valley of flowers'. I could spot Lupines, Indian Paintbrushes, Asters, Avalanche Lilys, Beargrass.



Nature



NATURE

Trust by Cindy Knoke



Trust



is an honor,



that is earned,



and easily broken.

NATURE



The Holler Hummers have learned to trust,



and will feed readily from hand.



My husband and son volunteer occasionally for photos,

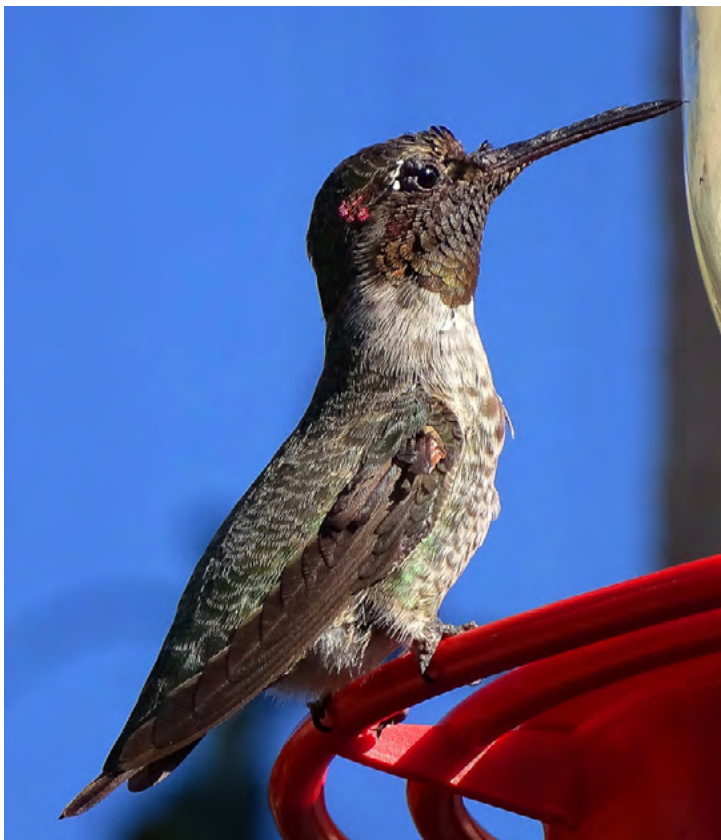


as you can see in this photo, but mostly I do it myself,
which is really quite comically difficult.

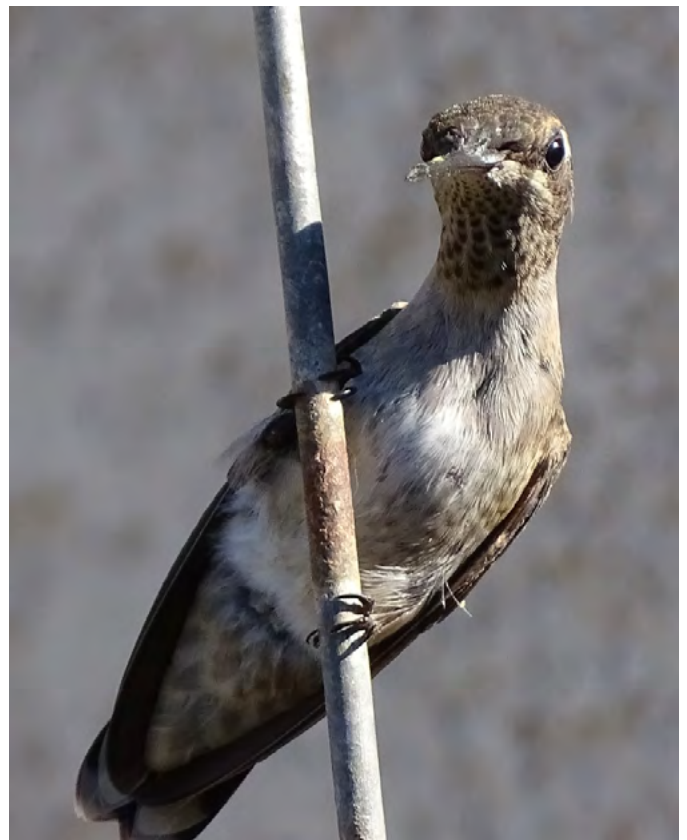
NATURE



I hold the camera with my right hand and the feeder with my left! But the experience of concentrating, vibrating, hummingbirds feeding from your fingers, so close to your face and eyes, is so simply phenomenal, that's it's worth is above words.



It is amazing what we will do, and receive back, for unselfish love.



Cheers to you from The Holler Hummers~

Nature

The Beauty of Chinese Lantern Pods by Karuna



I have long been fascinated by [Chinese Lantern](#) plants. One of my neighbors has them lining the fence in front of her yard. In reading about them for this post, I learned they are nightshades, and therefore are related to tomatoes, peppers and eggplants.

I try not to pluck any bloom before its time so have never had the opportunity to look at the pods closely. However, when I walked by the house yesterday, one of the pods was lying in the middle of the sidewalk. I took it home and began my investigation! What follows is a mixture of camera and microscopic photos.



The pod itself has a consistency similar to a heavy paper. When I opened it, I discovered that it was not the hollow object I had thought it to be. The red ball I found inside was striking, and it did indeed seem similar to a ripe tomato.

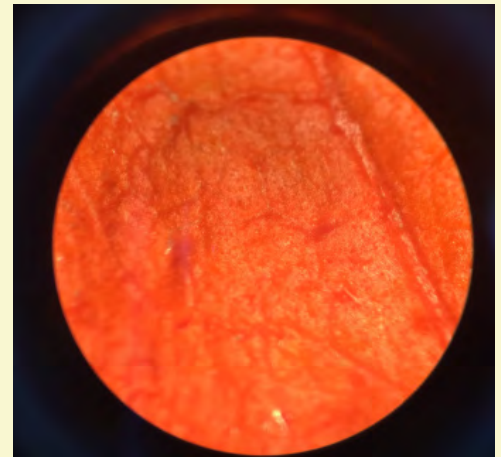
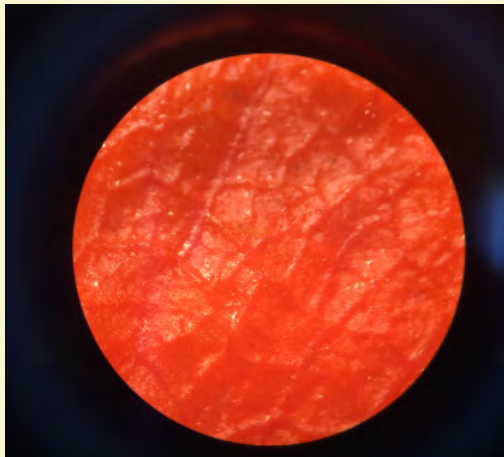
Nature



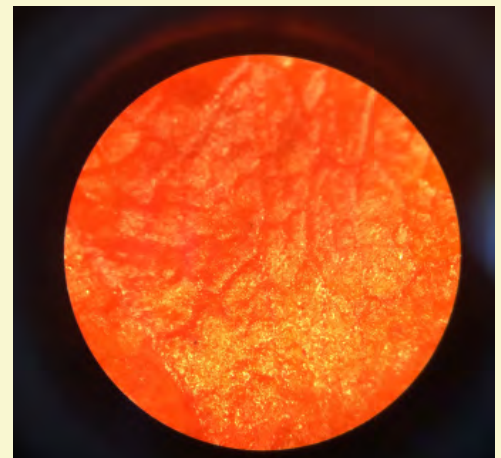
When I opened the fruit, it looked even more like a tomato. One of the things I learned later was that the fruit is edible when it is ripe, although not very tasty, but it is poisonous when it is not ripe. I felt relieved I had had the intuition that I should wash my hands after cutting it open.

Using the microscope I had the privilege of once again viewing the beauty and intricacies of nature.

Here are photos of the pod from the outside

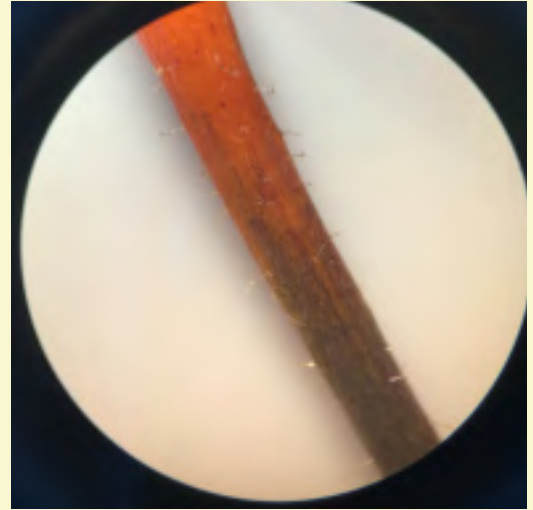
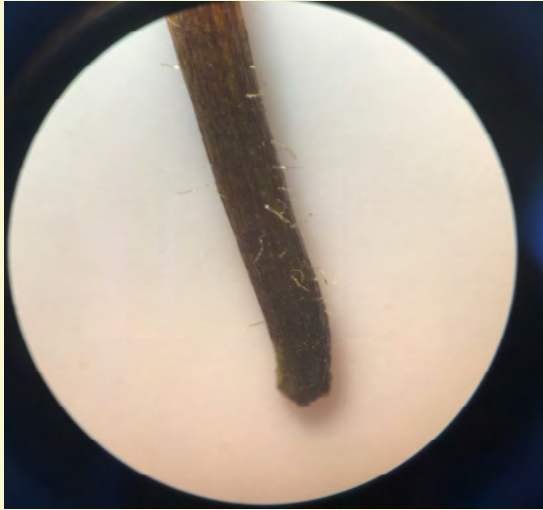


and the inside.

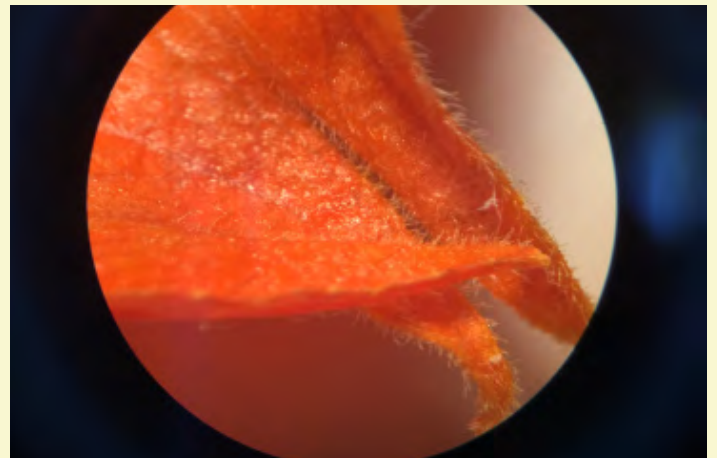
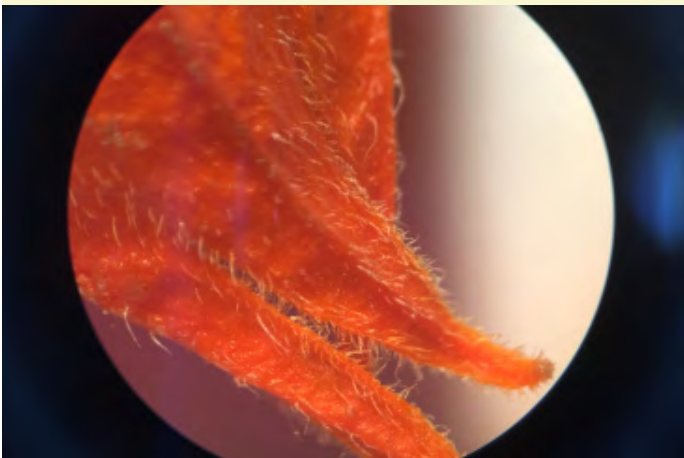


Nature

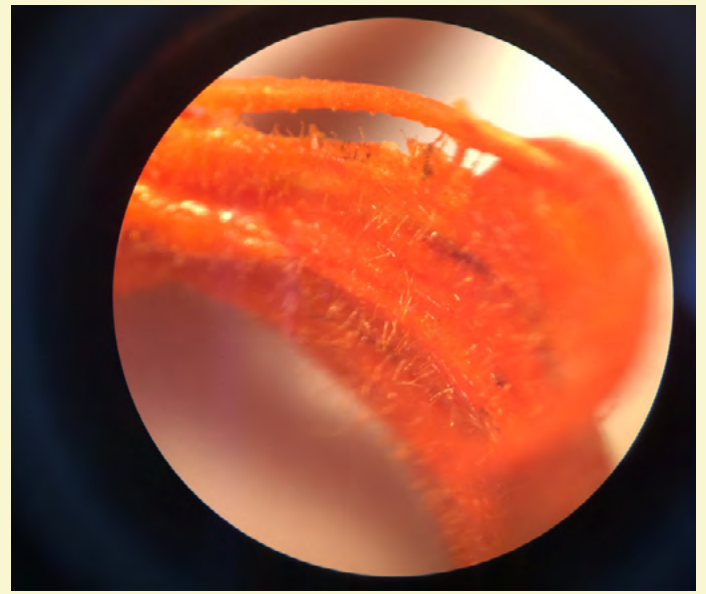
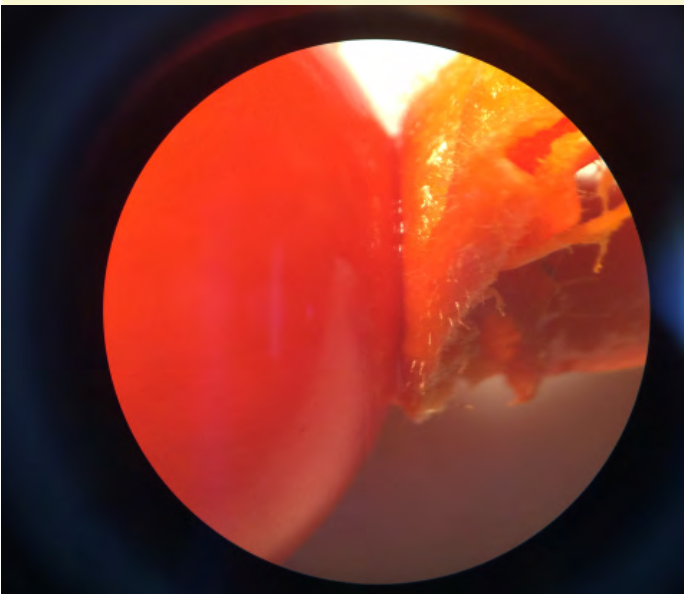
The stem has multiple colors and features.



Here is what the bottom of the pod looks like.

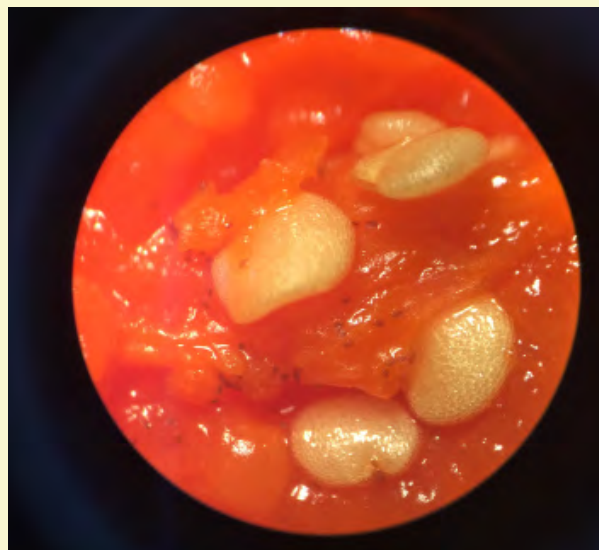
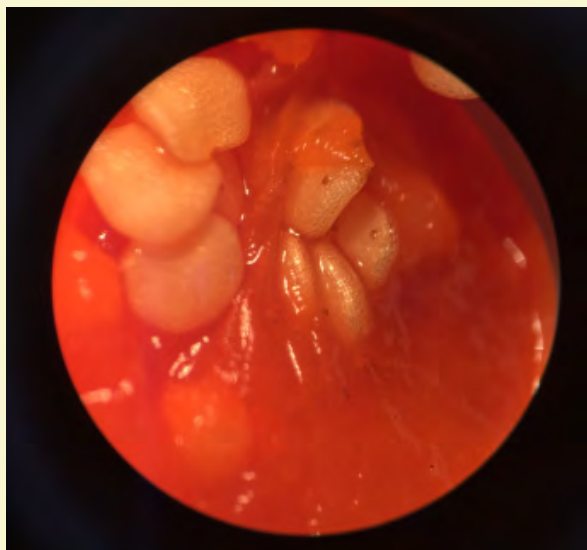


Once I opened the pod, I found the shiny red fruit and the part that connects the fruit to the pod to be so interesting.



Nature

My favorite views came when I looked inside the fruit.



I hope you enjoyed this journey into the Chinese Lantern pod. I sure did.



Nature

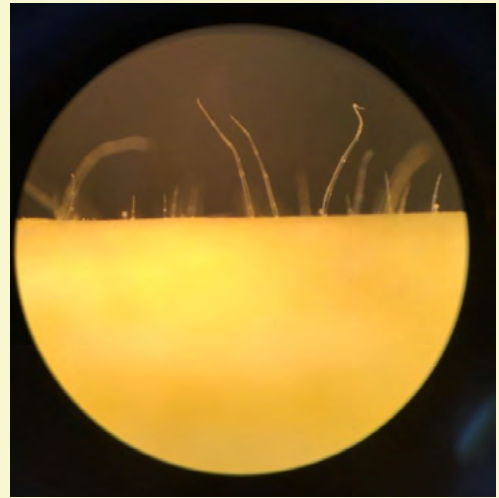
What's Your Guess? by Karuna

I have been taking a lot of microscopic nature photos. See if you can guess what these are photos of. Once you make your list, compare your answers with the answer key on [page 33](#).

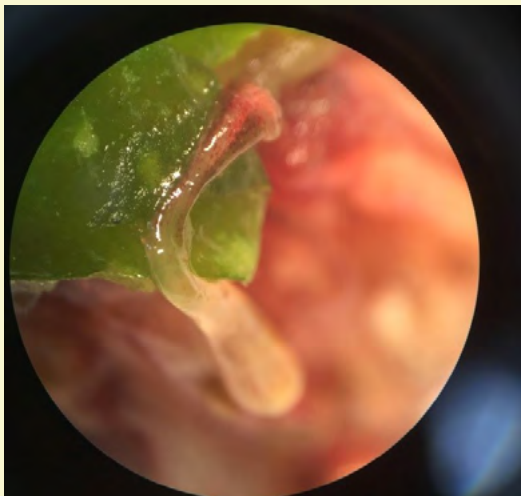
#1



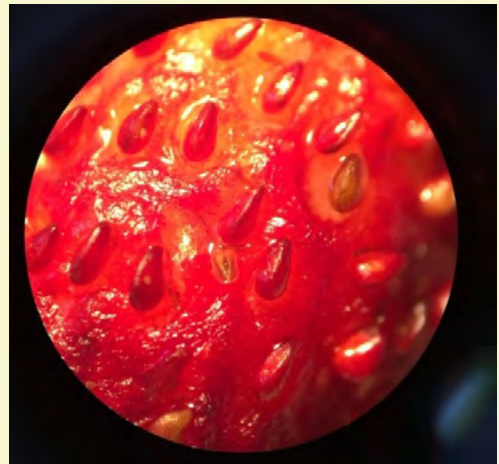
#2



#3



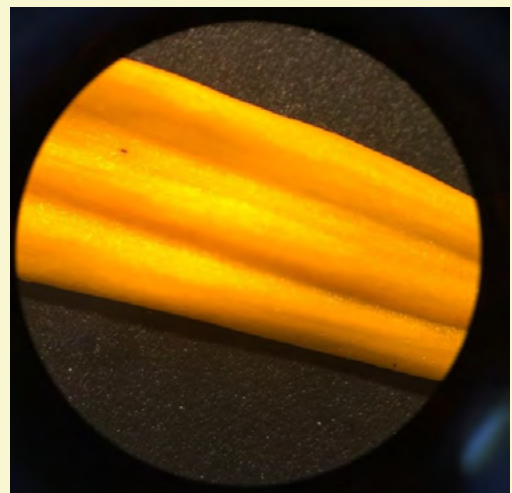
#4



#5

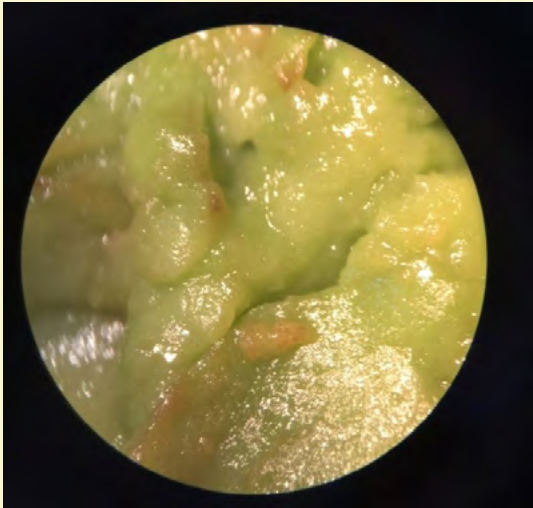


#6

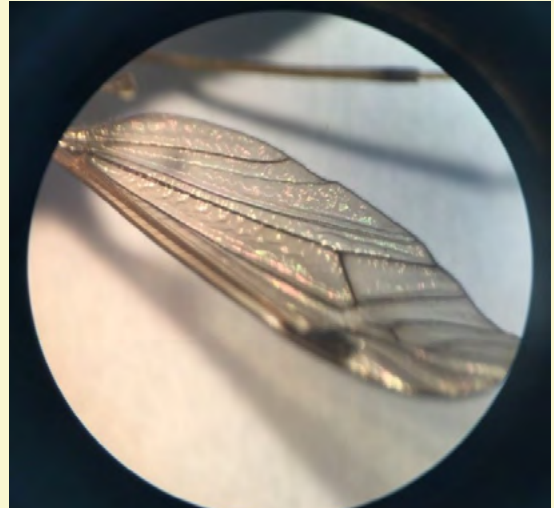


Nature

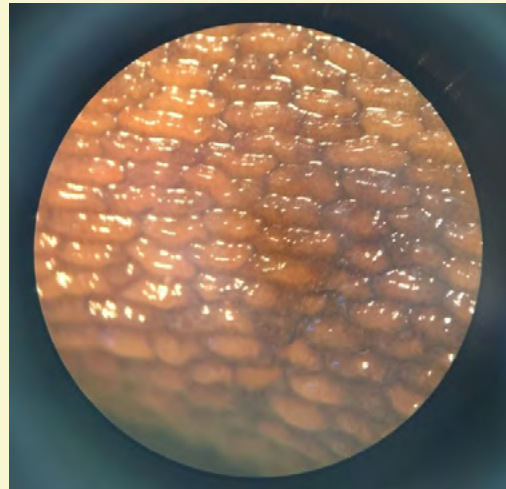
#7



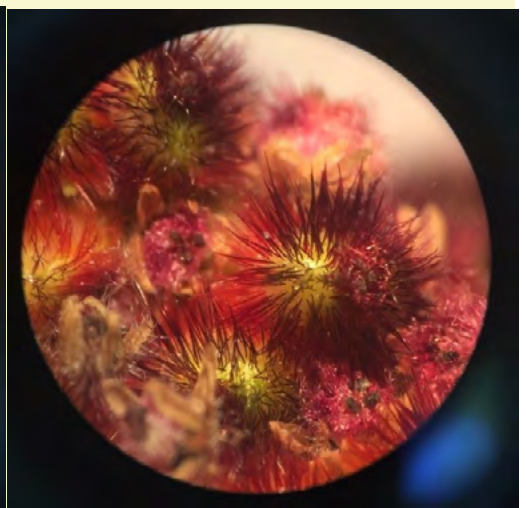
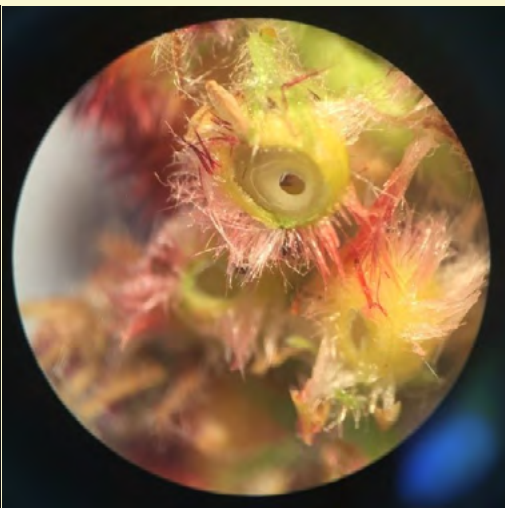
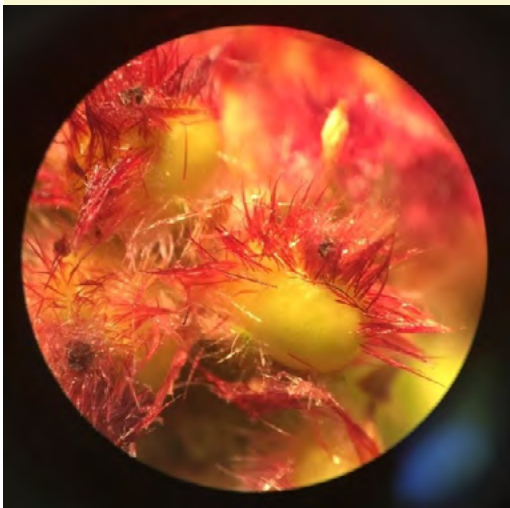
#8



#9



#10



You can find the answer key on [page 33](#).

PNW Litter Project

PNW Litter Project Stats

Thirty-four Litter Project members and friends reported picking up **69** hours of litter in August 2016. The average pick up time was **2** hours; the range was **1 minute to 10 hours** and the median was **1** hour.

Members of the project have picked up litter for **7967** hours since the project began in July 2011.

TerraCycle credited us with turning in **139,534** cigarette butts in **2013** and **55,200** in **2014**. Our **2016** count stands at **25,400** butts, bringing us to a grand total of **300,124** butts since we started sending them to TerraCycle in January 2013. (In addition to the butts we turned into TerraCycle we also have a 5 gallon jar of cigarette butts we use for the litter project display)



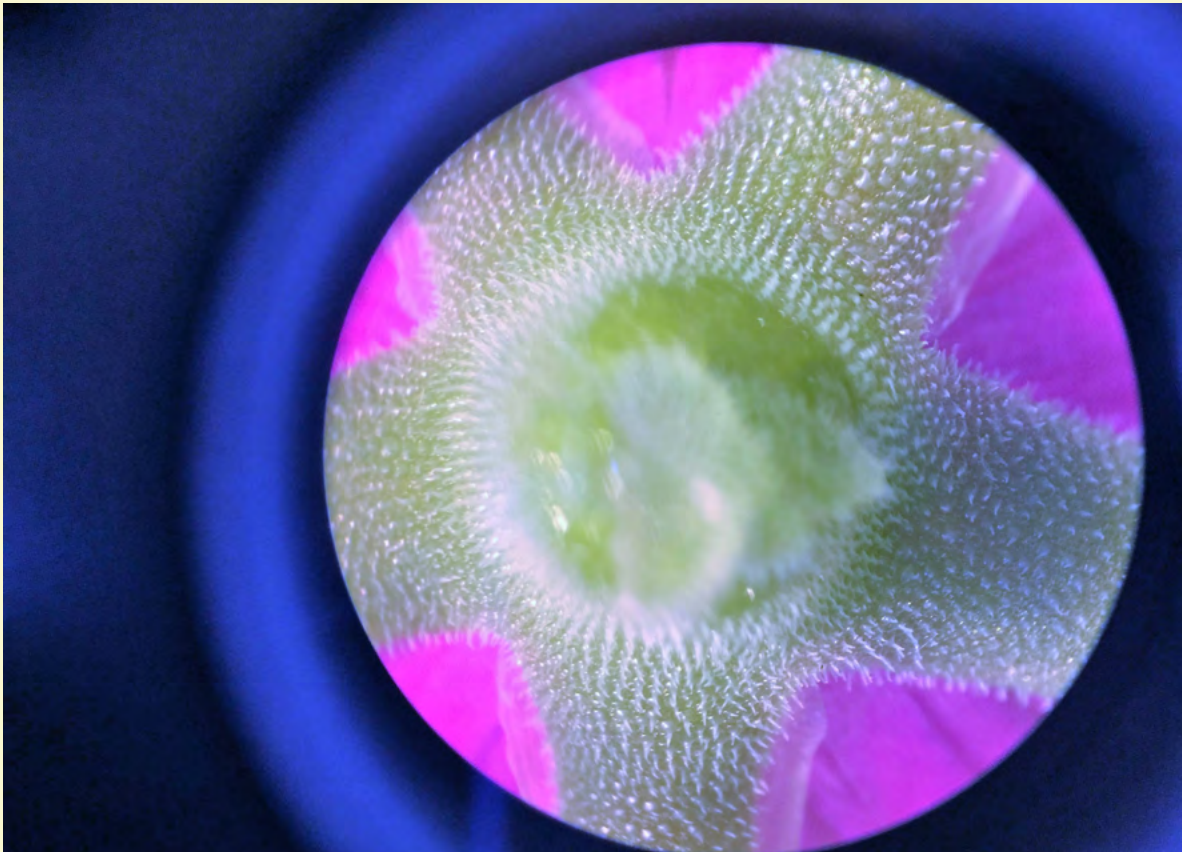
photo: Cindy Knoke

Answer Key

What's Your Guess?

Answer key (for What's Your Guess article on [Page 30](#))

1. tree bark
2. crook neck squash
3. fig
4. red strawberry- wild variety
5. white strawberry- wild variety
6. Black Eyed Susan flower petal
7. avocado
8. dragon fly wing
9. slug
10. pod from sumac tree



Interesting Information from our Readers

From Meenamba in Amritapuri:

Vani (US) sent me this and I thought of you and GreenFriends. Besides plastic waste and water waste, food waste is the issue that is closest to my heart... This is an interesting idea for raising awareness.

<http://www.npr.org/sections/thesalt/2016/07/29/487089896/salvage-supperclub-a-high-end-dinner-in-a-dumpster-to-fight-food-waste>

From Kenna del Sol in Amritapuri:

Read posts on Agriculture, Biodiversity, Climate, Environment, Food Security, Home and Garden, Business and more.

[Regeneration International: Cool the Planet Feed the World](#)

From Lin in Bellevue:

This short video is chock full of handy vegetable gardening tips I've not seen elsewhere.

<http://greenerpatches.com/2016/08/01/helpful-tips-to-start-your-vegetable-garden/?src=bottomxpro-mo&ro=1&t=mxp&et=fbsfg&eid=50332&pid=50332>

From Embracing the World:

“Amma feels strongly that everyone should be able to eat vegetables grown organically at least once in a week, and that the act of growing these vegetables on one’s own is a practical step we can all take to help restore the lost harmony between humanity and nature. Inspired by this call, our volunteers have started cultivating organic gardens in their own home and in community gardens all over the world. Through online learning and local training courses, volunteers learn how to utilize every possible location to grow vegetables – from balconies to window sills to community gardens. While we recognize the value of biotechnology in reducing world hunger, we also recognize the importance of preserving heritage seeds. In that spirit, we work to inspire the world community to rise to the challenge of growing and developing a seed bank with non-genetically altered seeds.”