If you, like me, start to go into a post-gardening funk after the first hard frost, remember that there is nothing like a chrysanthemum show to lift your spirits on a gloomy November day. This year’s gala at The Botanic Garden of Smith College in nearby Northampton, MA is now a memory, but put it on your bucket list for next fall even if you aren’t suffering from dormant season disorder.

Don’t expect a huge display — this one is in two moderate-sized greenhouses, not remotely near the scale of The New York Botanical Garden. But what Smith lacks for in size, it makes up for in charm. This year, design elements were borrowed from three shrine and temple complexes in Nikko, Japan, which are designated a UNESCO World Heritage Site. Over 100 buildings, most dating back to the 1600’s, are featured there along with statues, ancient trees and historical artifacts. At the show, lanterns, a red Torii gate, mosses and conifers were included as direct representations of features in Nikko, while the chrysanthemums themselves served to represent the beautiful fall colors of the Japanese mountains. What I ignorantly viewed as a Buddha statue wearing a red do-rag puzzled me, until I read an informative poster. The statue is properly called the Jizo Bodhisattva. He is a protector of travelers, women and children, and is especially important to pregnant women and those who have lost children. Such statues are thus often clothed in children’s hats and bibs. I wasn’t prepared to discover such an interesting cultural nugget at a flower show, but obviously the horticulturists at Smith are clever enough educators to get a clod like me to ponder and learn.

The mums, of course, are the stars of the show, providing a living encyclopedia of flower colors and forms. Indeed, mums seem to come in just about every shade of the rainbow, with the exception of true black and blue. And one of the most vibrant displays is also particularly noteworthy. Smith students have studied chrysanthemum breeding techniques since the early 1900’s, and the new hybrids are on offer for public perusal and voting. I’m uncertain of the winner’s prize, but all were worthy of an “A” in my book.

That the chrysanthemum is among the most trainable plants is also well illustrated. The cascades are hanging curtains of brilliant color,
created by mums trained to grow down chicken wire waterfalls. The varieties used are specifically bred for this application, but still must be painstakingly coaxed and pinched. Yellow, pink, magenta and white cascading mums on the greenhouse walls enveloped the entire show in a floral embrace. The standards, typically done with large-flowered varieties, are mums trained to produce one single stem with a sole, massive flower on top. Some of these soared seven feet in height and seemed guaranteed to elicit a “good golly” from even the least green-minded observer. The gigantic orange spiders and lilac-hued, reflexed-petaled balls rivaling the size of a good cantaloupe are nothing if not impressive, fantastic, and amazing.
Climate change: first, the good news

On October 4th and 5th, I had the pleasure of attending the “Organic and Sustainable Gardening in a Warmer World Conference” at Cornell University. The campus alone is an amazing place to visit, and getting to meet with so many people who are concerned about our natural world was inspiring.

The good news appears to be that New York, at least upstate New York, will fare pretty well. With our frost-free period increasing by 7-10 days since the 1960’s, we can plant earlier and make many more successive crops a year. Also, with higher temperatures in the winter months and an average of 16 less days with snow cover, we can hope to overwinter many more hardy crops, like kale, lettuces and spinach. The precipitation levels are expected to stay about the same, so we might not have to worry like some of the southern states about extended droughts.

As you may have guessed, there are also many downsides to all of this. Insects and diseases will also be more apt to over-winter in that warmer soil. Deer populations will soar. Pollinators might have a hard time arriving when flowers are ready for them, and invasive plants like kudzu, (which is already in parts of Long Island) will also begin moving into our area. There will be more 90 degree summer temperatures, and that rainfall might be about the same, but as we have already been experiencing, it will come in the form of more violent storms.

So, in order to appreciate the good news, we need to adapt. Ecosystems will be changing and reconfiguring. We need to pay more attention to nature and respond accordingly. And pay less attention to the calendar and be willing to experiment. If you always planted your tomatoes on Memorial Day, try planting half of them earlier. Sow some zucchini or other tender crops for the fall. Try some perennials or ornamentals that require warmer zones.

And most importantly, this conference urged all of us to get the word out to others. Climate change is very real. As gardeners, we see it and feel it. As stewards of the earth, we need to learn more so that we can make changes positively.

Yikes! Who Did This?

David Breary of Maine sent us this photo, wondering what or who could have possibly caused so much damage to the trunk of this tree. We determined it was the yellow-bellied sapsucker (*Sphyrapicus varius*), which feeds not only on tree sap but also on bark tissue and insects. While sapsucker damage is often seen as a grid of neatly spaced holes, larger patches of bark, also in a grid pattern, are sometimes removed, as seen here. Sapsuckers feed on a wide variety of trees, with some of their favorites being maple, birch, spruce and hemlock. But what of the tree? Intensive feeding can kill a young tree in one season, but for larger trees two or more seasons of repeated damage are needed for the total demise. This tree’s owner might contrive some sort of shield to discourage further visits by the sapsucker to the arboreal buffet.
Damage from ice and snow are facts of life in the Northeast, but the effects don’t always have to be disastrous. Even the best planned landscape may experience some ill effects of winter winds, ice storms, and heavy snow. Snow cover is an insulating factor if it is light and fluffy; a few inches of snow insulates the root zone against extreme fluctuations in temperature. However, even light snow can become compacted by traffic, thus mitigating its insulating value. A heavy, wet snow weighs down the branches and causes bending, breaking, or splitting and in extreme cases, uprooting of the entire tree. Fast growing trees such as boxelder, poplar, and silver maple are very prone to storm damage. Tree shape is also a factor with open limbs bearing the weight better than narrow crotches or most evergreens. Multi-stemmed evergreens that branch low to the ground such as pyramidal arborvitae do not handle heavy snow very well and often split under the weight. Removing the snow on evergreens soon after a heavy snowfall is helpful as is pruning of damaged areas to clean-up and ward off secondary damage from disease and insects. Small branches can be cut with loppers or pruners at the nearest lateral branch or bud. Large branches can be cut (using great care) with a saw, but consider calling in a certified arborist who is trained to evaluate the damage and prune correctly to maintain balance and shape. Recycle pruned material into kindling, firewood, or chip for compost. If the damage is extensive, consider first, is the tree worth keeping? Perhaps this is the time to “cut your losses” and have the tree removed. Is this a stressful location such as a place where the snow comes down off the roof? Would a large shrub suit the location better than a tree?

Ice is another matter. The extreme weight of ice on slender branches can cause the tree to take on a weeping appearance that is best left to Mother Nature to remedy. The effects of man’s attempt to tame winter with chemicals (such as various types of salt) often causes damage that does not become apparent until the temperatures warm. Road salt and de-icing agents can build up in the soil causing leaf burn. Leaching the area with water is helpful, but judicious use of the chemical is the best defense. Calcium chloride is less onerous than sodium chloride but more expensive. Using sand or gravel, or a combination of one of these with a chemical can reduce injury. Snow as the “poor man’s fertilizer” takes on a new connotation as it melts helping to leach away the salt accumulation. Winter is inevitable, but trees and shrubs do not have to suffer long term ill effects. Prompt action can make all the difference!

Resources:
“Repairing Storm Damage to Shade and Ornamental Trees,” Fact sheet, Cornell Cooperative Extension of Albany County.
Peltier, Patrice. “The Impact of Snow on Woody Plants,” pp. 8-10
TreeCare, Volume XII, Number 1, January 2001.

Text by Sue Pezzolla and photos by David Chinery
I’m not referring to the situation you may have gotten yourself into with the in-laws, the dinner or the gift exchange. I am referring to the German legend of decorating your Christmas tree with - a pickle? That’s right, pickles. With a surname like Schmitt, it is of course a tradition we practice at my house. I will fill you in, but I need to start at the beginning.

This tradition has a long rich history that is decidedly not Christian. Many ancient peoples believed the sun was a god and were naturally concerned as the winter solstice approached each year. They hung green boughs over the doors and windows to ward off evil spirits, illness and ghosts. The Egyptians called on Ra; the Romans honored Saturn; the Vikings of Scandinavia relied on Balder, all with the hopes that day length would increase, the summer would return, and the green plants would grow again. Later, the Druids, who worshiped nature, also got in on the act.

Bringing evergreens into the house in the “dead” of winter is a real treat. The fragrance of a Christmas tree is unsurpassed during this festive season. The Germans are credited with starting the indoor Christmas tree decorating tradition as we know it today. It is believed that Martin Luther, the 16th century reformer, was so taken by the brilliance of the stars twinkling among the evergreens one winter night that he added lighted candles to the tree to simulate the effect. The Pennsylvania German settlements had community trees as early as 1747. The first recorded display of a decorated tree was in 1830 by the German settlers in Pennsylvania. At this time most Americans saw this as a pagan symbol and thought the whole idea rather odd.

Fast forward to the large industry built around the modern holiday celebration. Today all 50 states grow Christmas trees. More than 100 million are planted each year with 98% of those produced on Christmas tree farms. Over 100,000 people are employed in the Christmas tree industry. Approximately 35 million trees are harvested in the United States each year. Some people think cutting and decorating a live tree is a detriment to the environment. Do the math and you will see that more trees are planted by the industry than are ever harvested, a net gain of more trees in the United States each year. And also keep in mind that these trees are grown on farms like a crop, meant to be “consumed” just like corn or wheat on a yearly basis. Christmas tree farmers are not depleting this renewable resource but rather increasing it each year.

Decorations for these live indoor trees have morphed over time as well. From lighted candles to modern LCD dancing lights; from natural ornaments of berries and cones to popcorn and small fruits on a string; from leaded metal tinsel to lightweight plastic; from handmade ornaments to fragile glass ornaments...which is where the connection to the glass pickle was born, I think.
It’s Not Easy Being Green:  

Good-bye 2013

As we wrap up this year with holiday ribbons and traditions, one of the strongest re-occurring themes echoing across all beliefs is: Hope. In that spirit, I’ll end 2013 with a bit of editorial larceny... to share with you this story of restoration and recovery.

Ancient Jar of Seeds by Stephen Messenger

For thousands of years, Judean date palm trees were one of the most recognizable and welcome sights for people living in the Middle East — widely cultivated throughout the region for their sweet fruit, and for the cool shade they offered from the blazing desert sun.

From its founding some 3,000 years ago, to the dawn of the Common Era, the trees became a staple crop in the Kingdom of Judea, even garnering several shout-outs in the Old Testament. Judean palm trees would come to serve as one of the kingdom’s chief symbols of good fortune; King David named his daughter, Tamar, after the plant’s name in Hebrew.

By the time the Roman Empire sought to usurp control of the kingdom in 70 AD, broad forests of these trees flourished as a staple crop to the Judean economy — a fact that made them a prime resource for the invading army to destroy. Sadly, around the year 500 AD, the once plentiful palm had been completely wiped out, driven to extinction for the sake of conquest.

In the centuries that followed, first-hand knowledge of the tree slipped from memory to legend. Up until recently, that is.

During excavations at the site of Herod the Great’s palace in Israel in the early 1960s, archeologists unearthed a small stockpile of seeds stowed in a clay jar dating back 2,000 years. For the next four decades, the ancient seeds were kept in a drawer at Tel Aviv’s Bar-Ilan University. But then, in 2005, botanical researcher Elaine Solowey decided to plant one and see what, if anything, would sprout.

“I assumed the food in the seed would be no good after all that time. How could it be?” said Solowey. She was soon proven wrong.

Amazingly, the multi-millennial seed did indeed sprout, producing a sapling no one had seen in centuries, becoming the oldest known tree seed to germinate.

Today, the living archeological treasure continues to grow and thrive; in 2011, it even produced its first flower — a heartening sign that the ancient survivor was eager to reproduce. It has been proposed that the tree be cross-bred with closely related palm types, but it would likely take years for it to begin producing any of its famed fruits.

Meanwhile, Solowey is working to revive other age-old trees from their long dormancy.

This story originally appeared on the website www.treehugger.com
Vegetable Garden Planning:

Crops and Varieties

As the seed catalogs come in, confusion and temptation may also set in. To a novice gardener, everything is new. Choosing which crops and varieties to grow will have limitations that are not detailed in the picture catalogs in front of you.

One way to help is to develop answers to the following questions:

**Will your garden be organic or conventional?** This decision involves much more than just seeds. Pest control, fertilization and soil health are decided here. Organic gardening in the truest sense of the word uses organic seed. This can limit your selection and be more expensive. Good quality is essential. A mix of organic and non-organic seed may be your best option. Conventional seed can be grown with your organic methods.

**Will you choose open pollinated and heirloom or hybrid?** Open pollinated and heirloom seed preserves the genetic traits of the variety. Saving seeds allows growing conditions and evolution to influence these plants. Our agricultural history is based on heirloom plants. Hybrid seed produces a new plant variety from two or more parents. Exceptional yield, new colors, disease resistance and cold hardiness are some traits possible with hybrids. Seed saved from these plants will not grow true.

**What crops will your garden site support?** Do you have enough sun for tomatoes, enough square footage for a block of corn? Is the soil deep enough for carrots? Are you located in one of the hill towns with a shorter growing season?

**Will you grow in containers or raised beds?** Size the plant to the container. Or size the container to the plant. Look for bush type varieties: patio tomatoes or bush cucumbers for example. Growing in these contained root zones presents a challenge. The plants quickly use up soil nutrients and moisture available and need more of that attention.

**What do you like to eat?** As a new gardener, stick with crops you can eat fresh. Map out small goals and celebrate your accomplishments. Perhaps a salad garden could be expanded to include herbs for a pesto. If you never had parsnips, why grow parsnip seed passed along or because it was a free offer?

Seed catalogs offer a wealth of information. Familiarize yourself with the plant descriptions, keys, tables, charts and graphs of each. Use this knowledge when standing in front of seed racks at local garden shops. Ensure success by planning crops and varieties that fit your bill.

Look for the AAS Winner label. All-America Selections is an independent, non-profit organization that tests new varieties then introduces only the best garden performers as AAS Winners. AAS has trial grounds here in New York and a display garden at the Berkshire Botanic Garden in Stockbridge Mass. The AAS label is like a stamp of approval. Check out their web site at [www.All-AmericaSelections.org](http://www.All-AmericaSelections.org).

Text and photo by Master Gardener Doug Pratt
Rensselaer County Master Gardener Richard Demick took these photos as late winter 2013 was losing its grip. They remind us now, as we enter winter once again, that the icy season will eventually warm with spring’s return. Richard writes, “Gardeners watch the birds all winter waiting for spring to appear. The male bluebird is sitting on the roof of his house where a brood was raised last season. The house has a side entrance thanks to the work of a confused woodpecker. The bluebirds use both entrances. The usual flock of grackles and redwing blackbirds sit in the poplars looking for any kind of hand out. Two mourning doves sit on the edge of the pool for half an hour "billing and cooing". The rest of the flock congregated on the shed roof waiting for us to share the wealth and distribute bird seed on the brick patio. The sad looking downy woodpecker is staring at the suet feeder taken over by grackles. The rabbit....whenever there is a shortage of birdseed on the ground, the next best thing is the Fothergilla bush. His excellent pruning technique may result in a much improved shrub.”
If you haven’t finished your gardening wish list yet, here’s a dozen suggestions you may want to consider. And, as you read, it’s okay to hum….or sing. Because we all know the music to…

...The 12 Days of Gardening!

On the first day of Christmas my true love gave to me….
… a shovel and a pear tree

On the second day of Christmas my true love gave to me..
… two garden gloves (and all of the above)

On the third day?
… three yards of compost (and all of the above)

On the fourth day?
… four ibuprofens (and all of the above)

On the fifth?
… FIVE garden boys (and all of the above)

On the sixth day? (Half way there.)
… six bulbs for planting (and all of the above)

On the seventh day?
… seven stakes for staking (and all of the above)

On the eighth day?
… eight bugs a-biting (and all of the above)

On the ninth day?
… nine worms a-working (and all of the above)

On the tenth day?
… ten frogs a-leaping (and all of the above)

On the eleventh day?
… eleven turfgrass lectures (and all of the above)

And on the twelfth day?
… twelve rugosa roses (and all of the above).

Text by Don Maurer
“I’m not a dirt gardener. I sit with my walking stick and point things out that need to be done. After many years, the garden is now totally obedient.”


Gardening Questions?

Call The Master Gardeners!

In Albany County: Call 765-3514 weekdays from 9:00 AM to 3:00 PM and ask to speak to a Master Gardener. You can also email your questions by visiting their website at www.ccealbany.com

In Schenectady County: Call 372-1622 weekdays from 9:00 AM to Noon, follow the prompt to speak to a Master Gardener and press #1. You can also email your questions by visiting their website at http://counties.cce.cornell.edu/schenectady/

In Rensselaer County: Call 272-4210 Tuesdays and Thursdays from 9:00 AM to Noon and ask to speak to a Master Gardener. You can also email your questions to Dhc3@cornell.edu

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