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The Cover
Look at the cherry blossoms!
Their color and scent fall with them,
Are gone forever,
Yet mindless
The spring comes again.
~Ikkyu
I am looking at a winter wonderland, seed catalog in hand, while dreaming of spring and the endless possibilities for my garden. Spring. The word breathes hope and anticipation into our winter weary souls.

Life. The smell of warm soil, the feeling of seeds sliding through our fingers, the first sight of new seedlings peeping through the earth, and the anticipation of the mature garden fills every gardener’s soul with a sense of renewed purpose. Seeds and plants are available to the twenty-first century gardener almost on every street corner. Local box stores, garden centers, discount stores, and grocery stores carry a wide selection of products to tempt our eye and purse. Unfortunately, they all carry the same plant selections grown by the same distributors to fill the demand for the latest color craze or have-to-have plant of the year. I must admit, I am usually there when the trucks arrive, buggy in hand, feasting upon the vibrant display of colors, textures, and forms, often leaving with several beauties.

Seed savers are ahead of the game. They have a wider selection of genetic diversity adapted to the local growing conditions. There is magic in a seed. They are a complete package providing all the young plant needs to begin growing. Under the right conditions seeds can be preserved for generations.

The oldest reported plant grown from ancient tissue is a narrow leaf campion that died 32,000 years ago in the tundra of northeastern Siberia. A date palm was grown from a 2,000 year-old seed recovered from an ancient fortress in Israel. The Gete-okosomin, a pre-Columbian squash believed to be extinct, was grown from 850 year-old seeds found on a Menominee reservation in Green Bay, Wisconsin.

My mother-in-law, Sarah, was a seed saver. She selected the best plants and carefully saved their seeds for her future gardens. They were labeled with the name of the person who had originally shared the seeds with her. Her goal each year was to have the first ripe tomato in the area and to have a productive weed-free garden. She always added new varieties while remaining faithful to her heirloom selections. My daughter, Sara, is following in her footsteps, actively cultivating and preserving heirloom varieties.

The Svalbard Global Seed Vault, in Norway, stores over 860,000 varieties of the world’s most important staple crops in the Arctic ice. The vault stores duplicates of local seed banks around the world, insuring against loss in the event of natural catastrophe or war. One recent deposit was 750 potato seeds from the Parque de la Papa, in Cusco, Peru. Andean farmers have bred over 2,000 varieties of potatoes, many lost to climate change, disease, and land use.

Whether planting a traditional “Three Sisters Garden” of corn, beans, and squash or containers of tomatoes and peppers, enjoy...
the process and produce. A flower garden also nurtures the soul while providing for our pollinators’ survival. Floral displays throughout the house warmly welcome everyone from family to friends, while proudly showcasing our green thumbs.

Thank you for supporting The Million Pollinator Garden Challenge, *The Frightened Frog*, leadership workshops, and all youth-related activities. Garden with a child. Happy gardening all ways,

_Sandra A. Robinson_

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**Leaping Into Action**

Designers and Diggers Garden Study Club, of Dallas, Texas, did indeed “Leap Into Action” over concern for our amphibians.

At our first club meeting this year we began selling *The Frightened Frog*. We also made it available at our Fall Convention for District X. A result: 100 copies headed into the hands of children.

The enthusiasm of our members led us to purchase 155 copies of the book and lesson plans to be donated to all the elementary schools in the Dallas Independent School District. After consultation with, and approval by, the district head librarian, they were ordered and delivered in late December.

We are doing our part to help prevent the largest mass extinction since the dinosaurs. We are thankful that the summer issue of *The National Gardener* brought this situation to our awareness so that we could indeed “Leap Into Action.” Under the umbrella of National Garden Clubs, Inc., the Designers and Diggers Garden Study Club adheres to the mission of protecting and conserving natural resources, providing education, and promoting civic and environmental responsibility.

—Eileen Eliason is Awards Chairman for Designers and Diggers and a former president of Designers and Diggers Garden Study Club.

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*(L to R): Dianne Crowder, Designers and Diggers Garden Study Club President; Karen Collins-Nobles, Board Member; Helen Crichton, Book Chairman; Gay Patrick, DISD; Veena Armstrong, DISD.*
With natural areas rapidly diminishing, species declining at historic rates, and climate change dealing new blows to environmental health, our managed landscapes have never been more important. Challenged pollinators and threatened Monarchs are just the tip of the ecological iceberg.

Unfortunately, many of our traditional gardening and landscaping practices have contributed to unhealthy ecosystems. The American love affair with exotic turf lawns is just one example of how we have compromised the environment we depend upon. Sustaining these compromised landscapes just isn’t enough.

EcoBeneficial gardening is a new approach that utilizes our landscapes to improve environmental health. It’s a powerful concept, empowering gardeners to become ecological stewards. Simple changes in our landscaping practices can make major environmental improvements—no matter the size of the landscape.

With these 20 steps, you can help transition any site into an EcoBeneficial landscape:

1) Reduce or eliminate the “Green Desert” (turf/lawn).
Exotic turf grass is an ecological wasteland of little value to other species. While offering little, it demands a lot—copious amounts of water, fertilizer, and labor. Keep only the lawn that you really use, and lose the rest. When replacing lawn, don’t replace one monoculture with another. Plant diversely using regionally appropriate native plants for best ecological function. A meadowscape is one great alternative to a turf lawn.

2) Increase the health of your soil.
There are more microbes in a teaspoon of healthy soil than there are people on Earth. Everything starts with the soil—healthy soil makes for healthy plants, which are the basis for a healthy ecosystem. But how healthy is your soil? Is your soil compacted? Overloaded with synthetic fertilizers? Do a soil test to determine the baseline of your soil and, even better, do a soil bioassay to determine the fungal and bacterial activity. Then, work with the native soil you have—in most landscapes compost will be the key to increasing soil health. Trying to reinvent your soil pH is an endless and losing battle, so work with the pH Mother Nature provided.

3) Avoid synthetic pesticides.
Synthetic herbicides, fungicides, pesticides, and rodenticides (collectively known as “pesticides”) are frequently devastating to sensitive creatures like bees. Determine if the “damage” you see in your landscape is really damage at all—or perhaps just a butterfly caterpillar feeding on the leaves of a host plant or...
The NEW Espoma Organic liquid plant foods are loaded with natural ingredients and millions of beneficial microbes to grow bigger, more beautiful plants. And with Espoma’s new Easy Dose cap, you’ll get a perfect pour every time. Just flip open the cap, pour the pre-measured dose into your watering can, and feed. No measuring. No mess.

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a leafcutter bee taking what she needs to line her nest. Rachel Carson warned about pesticides 50 years ago in her book, *Silent Spring*. Not good for wildlife, not good for you and your family.

4) **Limit the use of organic pesticides.**
Use organic pesticides only when absolutely necessary, and then, sparingly and carefully. Organic does not mean benign. Before using any pesticide, determine if the problem is really a problem, and if it is—choose a narrow spectrum treatment, not a broad spectrum one.

5) **Support beneficial insects, nature’s pest control.**
Plant a diversity of native plants to support beneficial insects with both habitat and food sources. Encourage the local populations of beneficial insects and skip the imported insects that can introduce new diseases.

6) **Tolerate some messiness in your landscape to support wildlife.**
Dead logs, tree snags, leaf litter, and brush piles are homes for many creatures. Dead leaves are nature’s mulch and compost—leave leaves in place as much as possible (although not on the Green Desert).

7) **Tolerate some plant damage in your landscape.**
Valuable insects have to eat too, and they don’t eat very much. If you enjoy seeing butterflies, then you need to sacrifice some leaves of the host plants their caterpillars require. Want more songbirds in your landscape? Support the multitude of insects that most birds feed to their young. To quote Voltaire: “Perfect is the enemy of good.” You are not perfect and your landscape doesn’t have to be either.

8) **Leave flowering perennials and native grasses standing through winter.**
Seed heads and stems can provide food and cover for many overwintering birds and insects. Leave perennials standing through winter and cut them back in early spring.

9) **Plant more native plants to support your local ecosystem.**
Native plants have co-evolved with each other and with the wildlife around them. Some creatures, like specialist bees, have very specific interactions with a limited number of native plants. Plant diversely, or lose valuable species.

10) **Think “plant communities” when selecting plants.**
Native plants don’t grow in isolation. Learn which plants grow together naturally in your region, and plant that way. You will support more species that depend on these increasingly challenged ecological communities. Check the website of your state’s Department of Natural Resources for information.

11) **Eradicate the exotic invasive plants in your landscape.**
Invasive plants threaten the natural balance that exists in healthy ecosystems—displacing native plants and the ecological services they provide. When removing invasive plants, always try organic, mechanical means first—and research the best method and time of year for removal. Be persistent and be patient. It may take a while.

12) **When invasive plants are removed, replace them quickly and thickly, favoring plants that are native to your region and**
appropriate to your site. Competition is the key to suppressing invasive plants. Select native plants that can stand up to the conditions. While Common Milkweed may not be the best choice for a formal garden, it can hold its own against many invasive competitors.

13) Limit the use of exotic, ornamental plants and understand their limitations. Plants that have not evolved in your region will not provide the same depth of ecological services to your ecosystem. While an exotic forsythia may appeal to you, it does little for a native bee in the spring, or a hungry migrating bird in the fall.

14) Encourage biodiversity by planting diversely. Science has proven that bio-diverse ecosystems are more resilient to pests, diseases, and the impacts of climate change. Plant diversely, but also plant sufficiently. It is far easier for a pollinator to find a sizeable target than to happen upon a single plant.

15) Select natural forms of native plants for best ecosystem dynamics. Cultivars that vary greatly from their native counterparts may not offer the same resources—a columnar selection of a native tree may have branching that deters birds; an odd colored “nativar” may not attract pollinators.

16) Avoid double-flowered plants. Double-flowered plants often have less nectar, pollen, and seed than single-flowered plants, or may be completely sterile. Reserve “doubles” for an ornamental indulgence in the garden, not for great ecological function.

17) Provide a water source for wildlife and insects. A clean, fresh source of water is crucial for wildlife but often forgotten in many landscapes. Whether a man-made pond, a natural stream, or a bird bath, make sure to include year-round access to water for wildlife. Think “wildlife ramp” not “deep water dive” and offer easy access for creatures large and small.

18) Emulate healthy local natural areas in your garden. Use nature as your reference for structure and plant selection—it will make for a much healthier ecosystem. Most natural ecosystems are layered, offering different levels of habitat for different species. While one songbird species may prefer to nest in the shrub layer, another species may prefer tall canopy trees. Reflect natural ecosystems to support your native wildlife species.

19) Always plant the right plant in the right place. Some plants are flexible about where they are planted, but many are not. Proper plant placement will promote plant health and help deter pests and diseases.

20) When choosing plants, find the beauty in ecological function. As Mom said: “Physical beauty is only skin deep.” Appreciate plants for what they do in nature, not just how they look.

For more information on EcoBeneficial gardening, please visit: www.ecobeneficial.com.

—Kim Eierman is an Environmental Horticulturist specializing in ecological landscapes and native plants. She teaches at the New York Botanical Garden, Brooklyn Botanic Garden, The Native Plant Center, Rutgers Home Gardeners School and several other institutions. Kim is an active speaker nationwide on many ecological landscaping topics. She also provides horticultural consulting to homeowners and commercial clients.
The New York Times has listed Grand Rapids, your 2016 convention city, as number 20 of the top 52 places to visit this year.

Grand Rapids is located on the Grand River, about 30 miles east of Lake Michigan. The city’s nickname, River City, refers to the landmark river for which it was named.

Register for the convention and come visit Grand Rapids. And, while you are here, enjoy tours that will further help introduce you to this “destination city.”

Go to: The National Gardener, Winter 2016; or http://michigangardenclubs.org/ngccconvention/ for full details and to register.

—Sharon Yantis, 2016 Convention Vice-Chairman

A Million Pollinator Gardens will be a million beacons of hope for the future.¹

• Plan now to include nectar and host plants for our pollinators in your spring gardens.
• Educate yourself by studying our new Pollinator Power educational publication, available in May, from gardenclub.org.
• Educate others by reading our new Inviting Butterflies Into Your Garden educational publication from gardenclub.org.
• Register your gardens at millionpollinatorgardens.org.
• And SHARE what you’re doing with the rest of us! We want you and your club to be recognized!

—Becky Hassebroek, MPGCLiaison

¹Bruce Rodan, U. S. Assistant Director for Environmental Health
You are invited to attend the OFAD SEMINAR
at Embassy Suites in South San Francisco, CA

August 25-28, 2016

Keynote

Designer: Tony Todesco

Additional Programs by Steven Brown, Lily Chan, Kathleen Hawryluk, Kika Shibata and Tuan Tran plus Hands-on Workshops with Steven Brown, Lily Chan, Pennie Chwalowski, Shahsha Middleton, Kika Shibata and Katsuko Thielke

NEW!! Thursday, August 25, 2016

Afternoon workshop by Katsuko Thielke, Those Big Brown Palm Spathes $65.
Evening workshop by Pennie Chwalowski, Construct a Construction $60.

Friday, August 26, 2016 - 1st Day

Morning tour to Flower Mart $20.
Morning workshop with Kika Shibata, Midollino Line Expression $80.
Afternoon program by Steven Brown and Lily Chan, Framed Designs
The Gallery dinner with Kika Shibata, Ikebana by Kika, Riji Sogetsu Master Instructor

Saturday, August 27, 2016 - 2nd Day

Morning workshop with Steven Brown and Lily Chan, Make a Frame $65.
Morning workshop with Katsuko Thielke, Leafs are a Changing $65.
Afternoon program with Kathleen Hawryluk, Auntie Mame’s Adventures Abroad
Keynote designer, Tony Todesco, What’s New in Design

Sunday, August 28, 2016 – 3rd Day

Morning program with Tuan Tran, Floral Magic
Afternoon workshop by Shahsha Middleton, Make it, Break it, Take it $60.

Advanced Registration for entire seminar including programs and 4 meals: $275.*

*Workshops are an additional fee as noted.

For registration form, membership and seminar information, contact Jill Coleman:
Telephone: 951-684-2635 Email: bcnjill@hotmail.com
OR
Visit website http://californiagardenclubs.com/ofad/seminar
The Vision of Beauty Calendar Committee is pleased to announce the publication of the 2017 edition of the calendar. The Calendar celebrates the floral and horticultural artistry of our organization. The Committee thanks the designers and horticulturists for submitting their photography. We look forward to continued support with your entries and sales.

The calendar showcases Traditional and Creative designs and small “pocket gardens.” All members of clubs affiliated with National Garden Clubs, Inc. are invited to submit entries.

The Committee works together to select and organize a calendar of high quality. In addition to flower designs, photographs of small “pocket gardens” are welcome.

Each entry is evaluated by the same criteria used in Flower Shows. The highest quality photos are essential to enable the Committee to properly judge the entries. Please see the revised entry requirements: (The requirements are also available on the NGC website.)

- **The Committee accepts only photographs taken with a camera with a minimum of eight (8) mega-pixels. Send a file that is a minimum of 300dpi. Sharp focus and proper lighting is a “must” for reproduction.**
- A digital print, size 5X7, taken with a camera with a minimum of eight(8) mega-pixels must be sent by mail, along with a current entry form for each design, to the Chair listed below. Please also email the digital image (jpeg), including the title and name of designer, to the Chair, ngcvob@gmail.com.
- Photoshop is discouraged, unless done by a professional, since it distorts color and sharpness.
- Photographs should not include ribbons, entry cards, or distracting backgrounds. Backgrounds should be free of wrinkles and patterns.
- Designers may submit a maximum of five entries. Please use padded envelopes when mailing.
- Do not use paper clips or Scotch tape. **Do not put designer’s name on back.**

All entries become the property of NGC, Inc. Notification will be given if used. No entries will be returned.

**CALENDAR DEADLINE: JULY 1, 2016**

Mail to: Brenda Bingham, 7 Lenape Trail, Cedar Grove, New Jersey 07009
After June 1st: PMB #219, 369 Montezuma Ave, Santa Fe, New Mexico 87501-2626
How to Take a High-Resolution Photo to Submit to Vision of Beauty

Nothing is more disappointing to the Calendar Committee than to select a photo of a fabulous design or garden scene only to have it rejected by the printer because the photo was not of sufficient resolution. Digital images are made up of thousands of pixels (blocks of color), and the number of pixels in the image will determine how high the image’s resolution is. High-resolution photos are required for sharp reproduction in publications, otherwise the printing quality is very poor.

Here are some tips so that you can produce a digital image of sufficient resolution for printing in the Vision of Beauty Calendar.

- Make sure your camera is rated at eight MP or higher.
- Set your camera to take the heaviest photo with the most pixels possible. (This setting is usually called Large.)
- Adjust your camera to the superfine compression setting if it permits compression manipulation.
- Do not use digital Zoom to take the photo.
- Do not resize the photo to send electronically. Send it at its full original size. If you cannot do this because of internet limitations, consider putting the digital jpeg photo onto a DVD or pen drive for mailing.
- Using photo-editing software may resize your photo to a lesser resolution, one of the reasons the non-professional use of Photoshop is discouraged.
- If the jpeg photo you send is less than one MB in size, it is doubtful that it will have the required resolution for excellent print reproduction.
- If you can view your photo’s properties using your computer, make sure it is at least 1350 pixels wide and 2250 pixels tall.
- One way to be sure that your Vision of Beauty Calendar entry photo will have the resolution needed to be reproduced by the printer is to have it done by a professional photographer. Professional grade cameras have bigger and better sensors, which produce higher quality pixels. Design groups and Flower Shows can consider sharing the cost of a professional photographer among their participants.
- Successful photos do not show entry cards or award ribbons. A plain background is preferred, and the photo must be well composed in terms of color, lighting, and framing. Make sure that there are no distracting shadows.

The Vision of Beauty Calendar Committee looks forward to receiving your calendar entries and hopes these hints will help you to get the best quality photos possible of your stunning designs and gardens.

—Sandy Mangels, NGC Calendar Committee, International Affiliates
Neonicotinoids: Silver Bullets that Misfired

© Aimee Cod

It was National Pollinator Week 2013. We had been getting the usual inquiries at the Xerces office: What type of bee is this? How do I make a bee nest? Can you recommend the best plants? Then the telephone started ringing with reports of dead bees—lots of them. Xerces staff members rushed to the scene, a big-box store in Wilsonville, Oregon, a half-hour drive from our office. We were startled to find the parking lot littered with bees—several species, including honey bees, although the great majority were bumble bees—with more falling from the branches above every minute. Xerces staff contacted the Oregon Department of Agriculture (the agency with legal responsibility to investigate), and then helped organize an effort to net the trees in order to stop the carnage.

The inquiry, undertaken by the Oregon Department of Agriculture, found that the bees had died from the application of a neonicotinoid insecticide, dinotefuran, to the linden trees (genus Tilia) that lined the parking lot. The trees were being treated against aphids, which drip honeydew that can coat sidewalks and parked cars below. With flow- ers rich in nectar, though, linden trees are a bumble bee magnet (honey bees may also gather honeydew), and the insecticide had lethal consequences far beyond its intended victims. An estimated fifty thousand or more bumble bees were killed.

This is the largest native bee kill ever recorded. The authors of some science blogs dismissed the number of bumble bees that died as being of small significance in that they were no more than the population of a healthy hive of honey bees, but an understanding of bumble bee biology leads to a different conclusion. Bumble bees live in small colonies, typically no larger than two to three hundred bees even at their maximum size; thus, the deaths of fifty thousand bumble bees are equivalent to the destruction of more than 150 complete colonies. And the impact is not limited to those colonies directly affected by the loss of worker bees. Rather, the effect carries forward into the following years as a result of fewer queens being produced to establish new colonies.

In the intervening two years, the Oregon Department of Agriculture has investigated and confirmed six more incidents of bee kills caused by the application of neonicotinoids (or “neonics”) on Tilia trees. The department has now acted to reduce the use of neonics, banning their application to linden, basswood, and other Tilia species in the state. While the large bee kills might have propelled neonics into the spotlight and brought some incremental gains in protection for bees, the scale of the risk posed by the use of these insecticides is huge and threatens a broad range of wildlife. Neonicotinoids began to be used in the mid-1990s. The U.S. Environmental Protection Agency was seeking less-toxic alternatives to replace organo-phosphate insecticides, which had been linked with a variety of risks to human health and the environment. These new neonicotinoid chemicals were characterized

Bumble bees have been shown to be far less efficient at foraging when exposed to neonicotinoid insecticides. They bring much less food to the colony, leading to fewer new queens and new colonies.
as “reduced risk” by the EPA and some were brought to market through an abridged registration process. They quickly became the most heavily used class of insecticides, and they now make up about 30 percent of the insecticide market worldwide. Neonicotinoids were used on farms, in parks, on street trees, and in gardens. They are generally present in all landscapes.

Dinotefuran, the product responsible for the Wilsonville bee kill, is one of seven chemicals that are classified as neonicotinoids. The others are acetamiprid, clothianidin, imidacloprid, nitenpyram, thiacloprid, and thiamethoxam. (Use of imidacloprid and nitenpyram for flea control in animals is generally excluded from discussions about neonic impacts on wildlife.) Neonicotinoids are synthetic insecticides similar in chemical structure to nicotine, and all of them control pests through the same mode, binding to receptors in the insects’ nervous systems and blocking nerve impulses.

Although each neonic poses its own unique risks, there are several overarching characteristics that are cause for concern: they persist in plants and soil for months to years after an application and can accumulate from one season to another; they are highly toxic to a broad spectrum of invertebrates, including beneficial insects; they are water soluble and readily move into rivers, lakes, and other water bodies; and because they are absorbed by plant tissues and become systemic (even when sprayed on foliage), they move into pollen and nectar, thereby following a direct route to exposure for pollinators.

In 2012, the International Union for Conservation of Nature passed a resolution calling for a comprehensive review of the impacts of systemic insecticides on biodiversity and ecosystems. The review was carried out by the Task Force on Systemic Pesticides, a multidisciplinary group of independent scientists, who studied more than a thousand research articles and reports. The task force’s analyses, published in a series of articles, in 2014, concluded that the current degree of use of neonicotinoids and other systemic insecticides is not sustainable. It found that these insecticides are causing significant damage to a wide range of beneficial invertebrate species, thus threatening the natural infrastructure that supports farming productivity and broader ecosystem health.

The cascading impacts of these insecticides go beyond crop fields. Their solubility means that they leach into the soil and then migrate into neighboring water bodies. A study from the Netherlands found that populations of insect-eating birds were declining in areas where there were increased concentrations of neonicotinoids in surface water. Swallows, starlings, and sparrows were the most affected, with the survival of these insectivorous birds jeopardized by the loss of aquatic insects, one of their major food sources. Worryingly, the latest research from the United States found neonicotinoids in more than half of the streams sampled in both urban and agricultural areas.

The Xerces Society takes a precautionary approach in response to neonicotinoid concerns. At the heart of the precautionary principle is the concept that, when there is evidence of a plausible risk, there is a social responsibility to protect the environment or people from exposure to harm. (This is the same idea that lies behind the adage “better safe than sorry.”) Furthermore, the protections cannot be lifted or changed until scientific studies are completed that provide reliable evidence that no harm will result from any changes. The precautionary principle has been widely embraced around the world in the decades since it was written into the Rio Declaration, of the 1992 United Nations Earth Summit. In Europe, the precautionary principle has been adopted into the policies and laws of the European Union. In the United States, the principle underlies environmental policy in San Francisco and many other communities. Within the world of pesticide regulation, the precautionary principle would shift the burden of proof onto the pesticide manufacturers. They would need to show that their products would not cause undue harm—rather than merely, as now, showing how the risks can be managed.

At the core of our work are efforts to promote ecologically sound pest-management practices that shift away from chemical-intensive crop production. Recognizing that farmers and pest-management professionals need feasible alternatives if they are to change their practices, Xerces is involved in research, including
working with Iowa State University to design integrated approaches to managing common soybean and corn pests. This project, which has the potential to affect millions of acres of production, will help growers understand what pests are problematic and when control measures are needed, thus shifting away from the prophylactic use of neonicotinoid-coated seed. It will also promote ecologically sound management methods once pests are identified.

Xerces also presents short courses on conservation biological control, the practice of supporting the native beneficial insects that prey upon crop pests. And we’ve worked with local communities and governments across the United States to develop city or county regulations banning the use of neonicotinoids on publicly owned lands; to date, we have helped thirteen cities and counties halt the use of neonic and have assisted two others in creating plans to protect pollinators from pesticides.

The scale of the problem posed by neonic is sufficient to warrant immediate action. When they first appeared on the market, neonicotinoids were touted as reduced-risk products, but our current knowledge paints a very different picture, and government policies must change to reflect the greater risk that we now know exists. Indeed, the story of neonic is a cautionary tale about an inadequate regulatory system that allows pesticides on the market before understanding their impacts, and a chemical industry that promises easy solutions to solve complex pest problems.

Neonics were touted as silver bullets and sped to market to replace other harmful insecticides. They may have resolved some of the problems caused by the older insecticides, but neonicotinoids brought their own array of negative consequences. In order to break this cycle of replacing one problem with another, Xerces works to increase understanding and implementation of more-sustainable practices with the greater goal of protecting the natural systems on which we all depend.

—Aimee Code directs the Xerces Society’s pesticide program. Established in 1971, the Xerces Society is a nonprofit organization that protects wildlife through the conservation of invertebrates and their habitat.

—Carol Bowdin is a “Floralies” member.
The Best Idea We Ever Had

I have fond memories of our national parks. When I was a little girl, my folks would take a big family vacation about once every three years, and they always included the experience of visiting at least one of our national parks! Do you have those same memories? I grew up in the flatlands of Southern Texas, so I was in awe when I encountered mountains, gorgeous waterfalls, caverns, geysers, animals I’d never seen before. Is this possibly where my deep-rooted love for critters of every kind comes from? And, possibly, my love of travel, as well?!

So, what is a National Park? According to Wikipedia, a national park is “a park in use for conservation purposes.” Although individual nations designate their own national parks differently, there is a common idea: the conservation of “wild nature” for posterity and as a symbol of national pride, administered by a national government. Widely held to be the first and oldest national park in the WORLD, Yellowstone was established by the United States, in 1872, as the first “public park or pleasuring-ground for the benefit and enjoyment of the people.” Doesn’t that just plain sound nice?

At that time, the area encompassing the park was a territory—Wyoming, Montana, and Idaho were not yet states—so the federal government assumed responsibility for the park, thus the term national park. Most national parks contain a variety of resources, encompass large land or water areas to help provide adequate protection of the resources, and include educational opportunities so that visitors can learn the importance of conservation and the natural wonders of the land in which the national park is located.

On August 25, 1916, 44 years later and 100 years ago, President Woodrow Wilson signed into law the National Park Service Organic Act, creating the U. S. National Park Service to administer our park units in a comprehensive way. Today, there are 59 national parks located in 26 states in the United States. In addition, there are 409 other diverse park units managed by the National Park Service, as well, located in all 50 states. Following our lead, there are national parks all over the world. 39 NGC members visited one of these, the Galapagos National Park, in Ecuador, in November—another unforgettable journey added to our list—and we saw wonderful things!

If you are as confused as I often am regarding what all of these park designations mean, maybe this will help. I’ve included an example of each:

♦ National Monument: Intended to preserve at least one nationally significant resource—the Statue of Liberty.

♦ National Preserve/Reserve: Established for the protection of certain resources—Big Cypress.
National Seashore/Lakeshore: Preserves shoreline areas and off-shore islands—Cape Cod.

National Rivers/Wild and Scenic Riverways: Preserves ribbons of land bordering free-flowing streams which have not been dammed, channelized, or otherwise altered—the Red River.

National Scenic Trails: Long-distance footpaths winding through areas of natural beauty—Appalachian National Scenic Trail.

National Historic Site: Protects a single historical feature directly associated with its subject—Teddy Roosevelt’s home.

National Monument/Historic Park: Protect features associated with American military history; the park includes a mix of historical and sometimes significant natural features—the San Antonio Missions.

National Military Park, Battlefield Park, Battlefield Site, Battlefield: Preserve areas associated with American military history—Vicksburg.

National Memorial: Protects areas that are primarily commemorative—the Lincoln Memorial, in Washington, D.C.


National Parkways: Ribbons of land flanking roadways and offering an opportunity for driving through areas of scenic interest—Natchez Trace Parkway, in Mississippi, Alabama, and Tennessee.

National Wilderness Areas: Insures that areas are managed to retain their “primeval character and influence, without permanent improvements or human habitation.” This makes wilderness areas ideal protected core areas for ecosystems. The National Park Service believes that wilderness management is the highest form of stewardship it can provide for the public lands in its care. The top three are in Alaska, with a total of 24 million acres protected; and next is Death Valley, in California, with over 3 million acres. If you get a chance, look at the list of National Wilderness Areas, it is indeed an impressive list!

For a few statistics (thanks to Catherine Hamm, reporter for the Los Angeles Times, for this information): The largest park unit is the Wrangell-St. Elias National Park and Preserve, in Alaska, at 13.2 million acres—a little smaller than the State of West Virginia.

The smallest is the Thaddeus Kosciuszko National Memorial, in Pennsylvania, at .02 of an acre, honoring the Polish general for his bravery in the American Revolution.

Of 293 million visitors in 2014, the largest number, more than 15 million, was logged at Golden Gate National Recreation Area. The most-visited national park that year was the Great Smoky Mountains National Park, in North Carolina and Tennessee, with a little more than 10 million. And, for the least visited we have to honor Alaska again—-with the Aniakchak National Monument and Preserve tallying 134 visitors in 2014.
About 22,000 people work for the National Park Service, with help from nearly a quarter of a million volunteers.

Founded just three years after the National Park Service, the National Parks Conservation Association is an independent nonpartisan membership organization devoted exclusively to advocacy on behalf of the National Parks System working to protect America’s favorite places. And, we are extremely fortunate to have its President and CEO, Theresa Pierno, as our speaker at the upcoming NGC Convention, in Grand Rapids.

American Pulitzer Prize-winning author Wallace Stegner wrote: National parks are the best idea we ever had. Absolutely American, absolutely democratic, they reflect us at our best rather than our worst.

Our National Park Service is celebrating its 100th anniversary this year. Celebrate by taking that much overdue trip to visit our parks! And, if you can, include your children, grandchildren, great-grandchildren, and any youth you can—I can assure you that it will have a lasting effect on you, and them, just like it did on me!

And, tell your friends!
—Becky Hassebroek, NGC Habitat Chair

Youth Pollinator Gardens Grant

National Garden Clubs, Inc. is excited to announce a new grant opportunity for garden clubs working with youth clubs or groups planning and planting Pollinator Gardens. Grants, up to $200, are available for projects that include educational materials on the vital role pollinators play in nature and youth involvement in planning and planting gardens providing nesting and food sources for pollinators. Youth will learn the importance of providing appropriate food sources, nesting areas, shelter, and practicing sustainable gardening practices for pollinators by planning, planting, and maintaining these pollinator gardens.

To apply for a grant, complete an NGC Grant Application (on the following page), provide detailed information about the project, and submit your request to the NGC Youth Committee Chairman, Lynne Ehnert, for approval.

—Becky Hassebroek, Youth Pollinator Gardens Grant Coordinator

Climb the mountains and get their good tidings. Nature’s peace will flow into you as sunshine flows into trees. The winds will blow their own freshness into you, and the storms their energy, while cares will drop away from you like the leaves of Autumn.
~John Muir, Our National Parks
NGC Grant Application for Youth Pollinator Gardens

Number of Members in Club or Council: Date:

Name of Garden Club:

District: State:

Club Member Contact Name:

Address:

E-mail: Phone:

State Awards Chairman: Phone:

E-mail:

Please complete the following. If additional room is needed, you may attach pages referencing these item numbers:

1. Project Name:

2. Project Begin Date: Completion (or Expected) Date:

3. Brief summary and objectives of project:

4. Involvement of club members, other organizations, etc.:

5. Project expenses:

6. Continuing involvement, follow-up, maintenance plan:

7. Attach or insert photos, digital photos, and/or landscape plan (does not need to be professionally drawn).

Please send to NGC Youth Chairman: Lynne Ehnert, W143 N6828 Aspen Drive, Menomonee Falls, WI 53051 or lehnert@wi.rr.com – 414-630-1959.

Grant monies for approved projects will be sent upon the project’s completion. Grant recipients agree to provide receipts for the reimbursable expenses (not to include cost of labor for member or youth), as well as pictures of the completed project. By submission of this request, the club grants NGC permission to publish all photos.

Spring 2016
NGC Schools News

Eric Hoffer said, “In times of change, learners inherit the earth; while the learned find themselves beautifully equipped to deal with a world that no longer exists.” Gardening, landscape, and environmental practices evolve and change. Gardeners need to keep learning. Since I first attended Gardening Study School twenty-two years ago, many key points have changed. It is not enough to have learned the subject matter of these schools once. For example, there is much more emphasis now on right plant, right place, and on pollinators and organic growing. We need the exposure to new information and new perspectives that can be obtained by revisiting NGC school courses and attending various refresher events.

Refreshers should generally be open to all, not just to refreshing Consultants. I have heard several recent stories about how attendance at various refresher events and council tours made the participants want to learn more and was a catalyst for them subsequently attending various NGC schools. One comment: “The power of learning and fun and friendship is huge.” All consultants in good standing in each school may refresh once in each school each calendar year.

By the time you receive this issue of The National Gardener the deadline to register for the Tri-Refresher at the NGC Convention, in Grand Rapids, Michigan, will have passed. If you are participating, please be sure to provide information about the date and place you last refreshed for each school for which you are seeking refresher credit. If you live in a state that does not have state schools chairman, please advise who/which state maintains your consultant records. Remember that you can receive multiple refresher credits only for those schools in which you hold Master Consultant status. In other words, you must be a Master Consultant in two or three schools in order to receive two or three refresher credits from one Tri-Refresher. All information pertaining to Multiple Refreshers is included in the Multiple Refresher Forms posted on the NGC website. All involved in conducting and attending these events should be familiar with this information, especially Form 1-14 (Instructions and Guidelines) and Form 5-14 (Ten Easy Steps).

Environmental Studies, Gardening Study, and Landscape Design Schools all provide for and encourage establishment of state consultants’ councils to encourage and/or sponsor schools and refreshers, use and share the knowledge gained from the schools, provide further learning opportunities, and to identify and promote projects and events that utilize and benefit consultants. Some states now have Tri-Councils instead of individual councils for “graduates” of each school, recognizing that the three school disciplines are closely intertwined, that consultants in one subject tend to be or become consultants in other schools, and that it may be easier to establish and maintain the infrastructure for one group as opposed to doing so for two or three such groups. Member consultants will want to be sure to periodically refresh their credentials in order to maintain consultant status and council membership. When a consultant lapses, he/she is no longer an NGC Consultant. There is an NGC Council Chairman for each of these three schools. Contact them for information about forming or maintaining such councils.

This chairman would love to receive your input regarding state by state costs for school/refresher venue facilities, costs for instructors and other costs and fees charged for schools/refreshers. We would like to share this information and perhaps be able to provide ranges of expenses and revenues for your use in planning your educational events. In the interim, you may want to look for this kind of information by reviewing information posted on the websites of various State Garden Club organizations. It might also be useful for us to compile
some criteria for the minimum numbers of participants to make a course or refresher viable and criteria (background, knowledge) to make a successful local school chairman. So, please share.

NGC Schools provide the infrastructure to help carry out the educational mission of NGC and of your State Garden Clubs. Schools are an opportunity to promote your clubs (and should be promoted to the public, not just to garden club members), attract new members, and perhaps raise some funds for your organization. General information, curricula, and forms are posted on the NGC website under Schools. Following instructions in school handbooks and working with your state and national schools chairmen expedites the process.

Leap into Action to plan and attend schools and refreshers in 2016.
—Greg Pokorski, ES, GS, and LD Schools Coordinator; GregPokorski@earthlink.net

Gardening Study Schools News

As you are planning your Gardening Study School’s curriculum in the area of “Suggested Supplemental Subjects,” have you thought about including our current theme of Reconciliation Ecology? As mentioned in the Gardening Study Schools description on the NGC website: Additional topics and areas of interest that may be covered are subjects, such as Reconciliation Ecology (the science of inventing, establishing, and maintaining new habitats in places where people live, work, and play), and creating backyard habitats to help endangered species, such as pollinators and amphibians. Using the articles published in The National Gardener, local speakers could be requested to cover these areas in the one-hour time slot allotted for Supplemental Subjects.

“Reconciliation Ecology,” an article published in the Fall 2015 issue of The National Gardener, “Urban Greening,” in the Winter 2016 issue of TNG, and “Protecting our Pollinators,” on page 42 in this issue, each lends itself to a one-hour presentation for your Gardening Study Courses. Leap Into Action with Reconciliation Ecology at your Gardening Study Schools.

In the spirit of conformance and cooperation, another change is simplifying the school registration process. Upon state approval, a GS School can be registered directly with Katie Roth, at NGC Headquarters, by sending in $5, with Registration form 05-1, without listing the instructors. This allows that information to be immediately posted on the NGC website. Of course, the instructor information should follow as quickly as possible. And Region Directors and State Presidents are being asked to list on their websites, neighboring states’ School information.

Bring Gardening Study Schools to your state!
—Barbara Hadsell, Gardening Study Schools Chairman; barborahadsell@cs.com
As we become parents, grandparents, and admiring friends of special people in our lives and garden clubs, there will be times when we wish to honor someone who shares our love of gardening. And that will be the moment we decide to choose the perfect gift for that “special someone.”

Your choice of giving the gift of a National Life Membership will demonstrate to them your appreciation of their commitment to the youth of our nation, the future leaders of our world. Your gift of $200 to become a Life Member is shared equally by the Scholarship Fund and the Permanent Home Endowment Fund.

The recipient will receive a life time subscription to *The National Gardener* and may attend the National Life Member Banquet at all Conventions.

The new Application form issued by this Administration may be obtained from National, Region, or State Life Membership Chairmen, or by going to the NGC website: [www.gardenclub.org](http://www.gardenclub.org).

The following Awards will again be presented at the NGC Convention in May.

- $100—for the state with largest increase in NGC Life Members.
- $100—for the state with the largest increase in NGC Life Members per capita.

REMEMBER: Special garden club members, birthdays, anniversaries, graduations, Valentine’s Day.

Looking forward to processing your applications.

—Alice DeSomma, NGC Life Membership Chairman

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**Environmental School Planning**

Environmental School Planning is in full swing. Remember that you register the course directly with Katie Roth (kroth@gardenclub.org), at NGC Headquarters, by sending in $5 and the top half of form # 1. She will notify me and the accrediting chair.

This is also the basic information a school’s chair must understand:

- Have a current copy of the *Handbook* with updated course requirements (2013).
- Seven years from first course to completion of all four (calendar).
- No restriction on closeness of courses offered, but each MUST meet the guidelines (no one field trip for both or one test for both).
- After becoming a consultant, there are five calendar years between refreshers allowed, but only one per year accepted for refreshing. This starts the next year after completion.
- Extensions are only for one year, once.

No school will be given post accreditation.

Please remember that each individual is responsible for keeping records of completed classes.

All the above being said, ESS is a wonderful experience for all concerned. Lots of learning, wonderful field trip experiences, and a great way to introduce new potential members to an alternate view of what a garden club person is. There are some great experiences waiting for you; go find one and enjoy.

—Pat Rupiper, NGC ESS Chairman

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I am glad I will not be young in a future without wilderness.
~Aldo Leopold

The clearest way into the Universe is through a forest wilderness.
~John Muir

The National Gardener
“Floral” Magazine
Celebrating its 25th Anniversary

British philosopher Sir Francis Bacon said that the printing press was an invention that would change the world. Even today, when the digital age offers instant electronic means to communicate, printed material is still a vital form of communication. In Mexico City, the Federación Mexicana de Jardinería y Arreglo Flora publishes “Floral,” a medium-size magazine that informs of all activities related to garden clubs in the Federal District.

“Floral” was first printed in 1991, and a number of its former editors, Esther Salinas, Isabel Ibargüen, Emilia Luna, and Ursula Beick, are well-known to NGC members. Magazines, such as “Floral,” are treasured because they print valuable information featuring NGC Schools, Symposia, International Conventions, and Flower Shows. In addition, “Floral” is an important source that helps with education as it offers articles featuring Floral Design, Horticulture, and Conservation written by International Flower Show Instructors. Horticulture and design businesses have also found out that advertising in “Floral” is the best way to communicate with garden club customers in Mexico, and Central and South America.

As International Affiliates Liaison, I receive a copy, and for me having “Floral” at hand is sometimes the perfect way to unwind at the end of a busy day or to enjoy while waiting for a delayed plane to take off.

Congratulations are due to the Federación Mexicana de Jardinería y Arreglo Floral for the 25th Anniversary of “Floral.”

¡Gracias queridas amigas de Mexico por tan excelente publicación!
—Idalia Aguilar, International Affiliates Liaison

Fund-raising and Ways & Means Packages from Ken Swartz - Sculptor of Metal Floral Design Containers for NGC for over 23 years.
Large & Small Boxes with 3-7 large sculptures, 8-15 minis, magnet tubes.
YOU RECEIVE 15% OF ALL SALES
Pay only after items are sold.
We pay all the shipping.
We’ll ship directly to your event.
All items are labeled with prices.
Keep items until they are sold.
Use any of our sculptures for design examples at your Symposia, Conventions, Design Schools, Judges Councils, and Flower Show Schools.
FOR MORE INFO, CALL 414-243-1290
WWW.BENTANDTWISTEDSTUDIOS.COM
BANDTWISTED@GMAIL.COM

Grow to Give
New Technology and a desire for connection inspire sharing the bounty

Record numbers of homeowners and renters growing edibles, combined with interest in health and food security and readily available technology, have led to a surge in groups helping to facilitate sharing excess backyard-grown crops. Apps, such as ripenear.me, allow gardeners to interact one-on-one to giveaway extras. Dozens of organizations, such as Nextdoor.com, AmpleHarvest.org, and Sharing the Bounty connect home gardeners with extra produce directly to their local neighborhood food banks. Friends with Flowers is leading the movement to transform flowers gleaned from neighborhood gardens into arrangements for local hospices. Seeds are also a hot trend for sharing, with Seed Swaps and Seed Libraries showing up across the country. This is a big trend to watch.
—Monrovia

Spring 2016
Landscape Design Schools

Landscape Design courses are planned for 2016 in many states as State Presidents and State Landscape Design School Chairmen have chosen to “Leap into Action.” Garden club members will be able “to study and to advance the fine arts of gardening, landscape, floral design, and horticulture” in keeping with the NGC Bylaws.

Landscape Design Consultants are reminded that their certification must be refreshed within five years from the year of their previous certification. Possible refreshers are attendance at a complete LDS course without taking the exam, a state Refresher, or a NGC-approved Refresher. Consider attending a course or Refresher out-of-state. A Tri-Refresher is planned on Monday, May 2, 2016, in Grand Rapids, Michigan, at the 87th Annual NGC Convention. Extension requests due to serious problems must be made before the certification expires.

Approval of Instructors, their outlines, and the exam questions is crucial to a successful and informative LDS course. State LDS chairmen are requested to contact instructors early in the process of setting up a course. Guidelines for handling this step can be requested from the LDS Instructors Chairman, Victoria Bergesen, victoriabergesen@gmail.com.

Please note a change in the site for a Course IV required reading: City Bountiful: a century of community gardening in America, by Laura Lawson. It is now available at: Http://agriurban.rutgers.edu/WhatisUrbanAg.html. Title: “A Brief History of Urban Garden Programs in the United States” is found at the bottom of the page. Click on the title, click “open” and the article will slowly appear. The LDS webpage on the NGC website reflects the change under “Forms.”

—Jane Bersch, NGC LDS Chairman, janebersch@aol.com

If you have difficulty opening the site, try these directions. Type in: Http://agriurban.rutgers.edu/WhatisUrbanAg.html and touch “search.” On the web results that appear, click on “Urban Agriculture in New Jersey, Rutgers University. Main menu for Urban Agriculture in New Jersey comes up. Go to bottom of the page and select/click: “A Brief History of Urban Garden Programs in the United States.” Internet explorer box appears. Select “open.” Message appears stating: downloading from site:rutgers.edu. Slowly, the article will appear. Increase the percentage, at lower right, to 50% to be able to read it better. Move arrow on right column down to obtain all the pages.

NGC Calendar

Conventions
2016 Grand Rapids, Michigan
May 2-6
2017 Richmond, Virginia
May 18-20 (Installation year)
2018 Philadelphia, Pennsylvania
May 21-24
2019 Biloxi, Mississippi
April 30-May 4 (Installation year)

Fall Board Meetings
2016 Portland, Maine
September 19-25
2017 St. Louis, Missouri
2018 Orlando, Florida
September 25-30
2019 St. Louis, Missouri
2020 North Carolina

Those who contemplate the beauty of the earth find reserves of strength that will endure as long as life lasts. ... There is something infinitely healing in the repeated refrains of nature — the assurance that dawn comes after night, and spring after winter.

~Rachel Carson, Silent Spring

The National Gardener
Garden Week

Proclamation
The Other Pollinators

By Donna Cottingham

When you hear the word “pollinator,” you usually think of the honey bee. That’s because the honey bee, *Apis mellifera*, is an outstanding pollinator. As industrious and social creatures, honey bees devote much of their time to efficiently collecting large quantities of pollen to feed the hive’s offspring, pollinating many flowers in the process. However, some less obvious insects sip nectar in the garden, and while less efficient than honey bees or native bees, should be recognized as valuable pollinators. Although often overlooked, a variety of moths, wasps, and flies pollinate flowers.

**Moths**

Although the majority of moths are active at night, some nectar-drinking moths are diurnal, or daytime feeders. One particular moth is busy in the garden all summer long. The hummingbird moth, *Hemaris diffinis*, mimics a hummingbird in appearance and movement. Its long proboscis, or tongue, makes it a good pollinator for tubular shaped flowers. It can be seen nectaring on verbena, bee balm, petunias, and a variety of flowers.

The small, yellow-collared scape moth, *Cisseps fulvicollis*, hardly looks like a moth. It is another daytime forager found on a variety of flowers throughout summer. It is active during the day, as well as around dusk.

The colorful ailanthus webworm moth, *Atteva aurea*, is a member of the bagworm family. In addition to pollinating flowers, this moth lays its eggs on the invasive ailanthus tree, and the caterpillars eat the leaves. The tree is also known as the “tree of heaven,” an invasive species from China that is crowding out our native trees in many areas of Virginia.

**Wasps**

Wasps make good pollinators. In fact, bees are descended from wasps and share many similar characteristics. The common thread-waisted wasp, *Ammophila procera*, drinks nectar as an adult, visiting and pollinating flowers along the way. It also performs other gar-
Tachinid flies, *Tachinidae*, covered with hairy spikes, can also be found sipping nectar. In addition to pollinating flowers, they produce larvae that consume the larvae of other insects.

While bees continue to be perhaps our most valuable pollinators, many secondary pollinators shouldn’t be overlooked. With so many flowers that require pollination in a limited season of time, it takes a variety of pollinators to get the job done. As gardeners, it is important for us to recognize the benefits of having a variety of insects in our garden by providing a variety of nectar sources and limiting pesticide use.

—Donna Cottingham, *Butterfly and Pollinator Chairman, Virginia Federation of Garden Clubs*

*I would feel more optimistic about a bright future for man if he spent less time proving that he can outwit Nature and more time tasting her sweetness and respecting her seniority.*

~E.B. White, *Letters of E. B. White*

It is timely to revisit this old favorite, which was recently called to this chairman’s attention when it was prominently displayed in a Monarch butterfly exhibit at a local library. Displaying children’s books throughout your plant sales, in your flower shows, and other public events will not only add vibrant colors, but will, hopefully, pique interest in reading the books.

The Very Hungry Caterpillar tells the story of a hungry caterpillar’s progress through an amazing variety of foods, making a cocoon around himself, and waking up a butterfly. The book has bold, colorful pictures and a simple text in large, clear type. An oldie, but goldie.

“\textit{A fallen blossom returning to the bough, I thought -- But no, a butterfly.}”
\textit{~Arakida Moritake}

The following recommendation is for young readers (ages 3-6).


This delightful book is full of vivid photos and explains the roles butterflies play in the environment. It includes fun facts, Creature Feature Fun, riddles, and a glossary. It lets young readers understand and appreciate why “It’s a Good Thing There Are Butterflies.” A lot of information is packed into this 32-page gem. Other books in this series are: It’s a Good Thing There Are.....Bats; Bees, Earthworms; Ladybugs; Snakes; and Spiders.

Happiness is a butterfly, which when pursued, is always just beyond your grasp, but which, if you will sit down quietly, may alight upon you.
\textit{~Nathaniel Hawthorne}
Book Reviews

Linda Jean Smith
NGC Book Review Chairman


Author Beverly Turner has been in the nursery industry for 20 years. She is a leading authority on miniature fairy gardening. Julie Bawden-Davis has a degree in journalism and is an enthusiastic gardener. She has written many books and articles on gardening.

This book is divided into nine chapters. Each chapter takes you step-by-step in creating your fairy garden, from developing a theme for your fairy garden to chapters on designing the garden. Floral and landscape designers will note that much of these chapters are devoted to discussing the principles and elements of design.

There are several chapters that go into the actual making of the fairy garden. Chapter six discusses “Planting and Care Practicalities” and chapter seven goes into container choices, while chapter nine contains a list of plants that can be used in a fairy garden. The chapter divides the plant material into sun and shade plants and then further divides them into low-growing groundcovers, mid-sized “shrubs,” and tall “trees.”

There is a resource section that lists places that sell fairy gardening material. In addition to the contact information for these places, it also lists what products they have available.

Scattered throughout the book are mini-tips, highlighted in gray, which provide some good information, such as understanding scale when designing your fairy garden. Although I’m sure the principles given in the book could be applied to any fairy garden, most of the gardens in the book were in containers. There are many wonderful photographs to help the reader visualize the gardens and dream up ideas.


Author Fiona McDonald spent four years of intensive study at the Julian Ashton Art School, in Sydney, Australia. She then moved to the Blue Mountains, of New South
Wales, Australia, and began making painted cloth dolls and figurative sculpture. She is an avid fairy gardener.

This book is divided into 17 chapters and includes step-by-step instructions on how to make a variety of fairy gardens. There are fairy gardens in terrariums, a hanging fairy garden, and outdoor fairy gardens nestled in ferns or poking through magic corners.

Later chapters include making crafts for the fairy garden, such as a chair from twigs, a fence from popsicle sticks, as well as ways of making fairies to inhabit your garden.

Fairy Gardening has become quite a fad, and this is one of many books on the subject. There are many lovely color photos of the different gardens, which can inspire ideas for your own fairy garden. What seems to be missing in this book is a list of plant material that can be used in a fairy garden, but the explanations of how to put one together are simple to follow.


Author Jane Powers has been a Gardening Correspondent for the Irish Times since 1997. She is also an inspector of Irish gardens for the Good Gardens Guide. Photographer Jonathan Hession, Powers’ husband, works in the film industry as a still photographer on movie sets. He developed a love of garden photography from her.

This is, indeed, a beautifully photographed book and is a joy just to look through. The book visits fifty of Ireland’s most beautiful gardens. The nine sections group the gardens by type or theme: There are the Grand Big Gardens, a behind-the-gates look at the gardens of the Anglo-Irish gentry; Romantic Interludes, where nature and gardening mingle harmoniously; Taming the Wilderness, with gardens coaxed from savage landscapes; Painting With Plants shows gardens of passionate plants people; Lovely Day for a Walk rambles through the rare and spectacular; A Few Follies and Fancies roams the magical and mysterious and the unexpected and the fantastic; Fields of Dreams covers where gardens grow from fertile imaginings. Old gardens, carefully reawakened from the slumber of gentle dereliction, are covered in Paradies Reinvented; and, finally, Good Enough to Eat shows some productive patches.

All the gardens covered in the book are open and welcoming to visitors. The author covers the important facts on each garden in a short amount of space, including the history of the garden, the period in which it was created, information on the owners and gardeners, and much more.

One of the interesting aspects of the
book is the variety of plant material in the gardens. Exotic plants, such as palm trees and bananas, grow because the Gulf Stream tail wraps around the western edge of the island. However, plants from colder regions also do well, such as edelweiss from Switzerland.

Looking at the photographs and reading about the gardens will make you want to take a trip to Ireland to see the gardens for yourself.

2016 Year of the Allium

Ornamental alliums have so many good things going for them that it's a wonder they're not more widely planted. But alliums are definitely on the rise. They seem to be popping up everywhere: in gardening books and magazines, on Pinterest boards, and in public and private gardens across the country.

Most allium flowers have a long, leafless stalk topped with a globe-like bloom that's made up of a cluster of individual florets. Like exclamation points, alliums stand out from other plants, adding emphasis and excitement wherever they're grown.

In recent years, alliums have been used to great effect in the naturalistic plantings of garden designers, such as Piet Oudolf and James van Sweden. They are ideal companions for ornamental grasses and other low-maintenance perennials, such as sedum, rudbeckia, echinacea, and salvia.

Deer are another reason alliums are increasingly popular. Some gardeners fight a daily battle with roving bands of deer that will munch on anything green. Alliums are on the short list of plants deer tend to avoid. In the garden, the plants are odorless, but step on them or chew on them and the cell walls break, releasing volatile, sulfur-based chemical compounds that have a pungent odor and bitter taste.

These sulfurous compounds, classified as secondary metabolites, are a defense mechanism against diseases and insects as well as predators. This makes alliums virtually bulletproof. And, though the foliage repels, the flowers are filled with sweet nectar that's highly attractive to honeybees, bumblebees, and other pollinators.

Edible alliums are among the world's oldest cultivated plants, but there is no record of them being used as ornamentals until plant hunters began collecting alliums in the mid-1800s. Another 150 years passed before the horticultural world started to fully appreciate their garden potential.

Alliums are members of the onion family, which is a big one and has more than the usual number of taxonomy problems. Formerly classified as alliaceae, they are now amaryllidaceae, subfamily allioideae. Experts are unable to agree on the number of species, with estimates ranging between 500 and 750.

The most popular ornamental alliums are grown from fall-planted bulbs, and the showiest of these are the big-headed ones, such as 'Gladiator' and 'Globemaster.' Alliums are native to mountainous regions in Central Asia, where winters are cold, summers are hot, and the soils are thin and porous. This gives them a tolerance, and even a preference, for dry growing conditions—ideal credentials for today's water-conscious landscaping.

Alliums are tough, cold-tolerant plants and most will grow in hardiness zones 3 to 9. As a general rule, they are not fussy about soil, though the ones with large bulbs require good drainage.

Alliums offer so many different flower sizes, heights and bloom times, that it's easy to incorporate them into almost any sort of garden or landscape. Plant a variety of different species to enjoy a succession of blooms that will keep your garden buzzing all season long.

—National Garden Bureau; author Kathleen Laliberte, of Longfield Gardens.
Escuela de Exposiciones de Flores

Percibo que el propósito de un jardín es dar placer y brindar claridad a la mente, calmar, purificar y exaltar al corazón.
~Gertrude Jekyll

NGC posee un plan preciso para su programa de Exposiciones de Flores, que no sólo incluye las exposiciones, sino las Escuelas y los Jueces. A menos que se lea y se adopte sus consignas, reinará el caos. En el Manual de Exposiciones de Flores, páginas 245-248, se explica el procedimiento, la ética y el juzgamiento. ¿Has tomado el tiempo de leerlos últimamente? Intenta leer el juramento de un juez, página 247, mientras te preguntas: “He faltado a alguna de estas promesas últimamente? Analiza las instrucciones durante las reuniones del consejo de jueces. Sin señalar a nadie, e incluyendo a todos, habla de cómo se debería manejar cualquier situación sensible, o de qué manera diplomática se podría recordar a un compañero juez del comportamiento correcto. Recuerda, el privilegio de llevar la distinción “Juez de Exposiciones de Flores NGC” conlleva serias responsabilidades. Por favor haga todo lo posible para ayudar a sus co-jueces a alcanzar estos ideales y a representar fielmente a NGC.

El porqué de los Formularios de Evaluación. Los formularios de evaluación son muy útiles al momento de mantener el nivel alto de la escuela o el simposio. No solamente destacan los puntos positivos y débiles de la experiencia en el aula, sino que sirven para recordar a los organizadores del evento de los aspectos positivos y negativos del lugar elegido. Las quejas más comunes se refieren a temperaturas extremas en el aula, la gente que charla durante la disertación, y el no cumplimiento de los horarios impresos en el programa. Todos estos problemas pueden ser evitados o remedidos con la planificación adelantada y haciendo cumplir reiteradamente los horarios.

Los Directores de los eventos deben cumplir otros requisitos también: 1. Las guías de estudio deben ser enviadas a todos los estudiantes seis semanas antes del evento, o al registrarse. 2. El folleto con la información del evento debe ser enviado al instructor antes de su llegada. 3. Se le debe pagar al Instructor sus honorarios y gastos del viaje, antes de que se retiren del lugar. 4. Los formularios de evaluación completados deben ser entregados puntualmente, tengan comentarios positivos o negativos. Recuerden que el Compendio para el Personal EEF e Instructores tiene toda la información necesaria para la organización de un curso o simposio.

Otra queja que se escucha frecuentemente es la dificultad de afrontar los gastos relacionados con la organización de una serie de escuelas o un simposio. Varias regiones han solucionado el problema mediante la rotación de la responsabilidad entre los estados, en años sucesivos. Si el factor importante es el viaje, entonces los jueces deberían pensar con anticipación cuál es el lugar más cerca. Aún cuando no es factible incluir toda la región, si un estado importante planea un simposio en un rincón de ese estado, pueden notificar a los estados vecinos para que apoyen la iniciativa con fondos y asistentes. (NOTA: Lo mismo vale para los países cercanos). Tal como organizar una exposición no es tarea para una sola persona, la organización de una escuela o un simposio no debería ser el trabajo de un solo grupo. Además, agrandar nuestro círculo de amistades e intercambiar ideas nos ayuda a crecer.

Las listas actualizadas de Instructoras Aprobadas, Comités de Escuela de Exposiciones de Flores, Personal del Estado, y formularios actualizados se pueden bajar del sitio web. Asegúrate de enviar el formulario correcto a la persona correcta para recibir la atención debida.

—Dorthy Yard, NGC Flower Show Schools Chairman
Flower Show Schools

*I hold that the best purpose of a garden is to give delight and to give refreshment of mind, to soothe, to refine and to lift up the heart.*

~Gertrude Jekyll

NGC has a comprehensive plan for its Flower Show program, which includes not only Flower Shows, but also Flower Show Schools and Judges. Unless these guidelines are read and followed, chaos usually reigns. *The Handbook for Flower Shows,* pages 281-285, explains etiquette, ethics, and judging policies. Have you read those lately? Try reading the Judge’s Oath, page 283, while asking yourself, “Have I compromised any of these promises recently?” Discuss these directives in your Judges’ Council meetings. Without pointing fingers, but including everyone, talk over how a sensitive situation could best be handled or the tactful way of reminding a fellow judge of proper decorum. Remember, the privilege of holding the title “NGC Flower Show Judge” carries with it serious responsibilities. Please make an extra effort to help your fellow judges realize these ideals and to represent NGC well.

Why Evaluation Forms? Completed evaluation forms are informative and useful in helping to maintain the quality of the school or symposium. They not only pinpoint strengths and weaknesses of the classroom experience, but also serve to remind the committee for the event the positive and negative aspects of the venue. The most common complaints involve extreme temperatures of the classroom, number and frequency of comfort breaks, poor quality of the speaker system, extraneous noise from people talking during the lectures, and not adhering to the printed timetable. With advance planning and continuous enforcement, all of these problems can be avoided and/or remedied.

Chairmen of events must adhere to other requirements as well: 1. Study guides/outlines must be sent to all attendees six weeks prior to class or immediately upon registration. 2. Brochures with information about the upcoming event must be sent to instructors prior to arrival. 3. Instructors must be reimbursed for fees and travel expenses before they leave the site. 4. Completed evaluation forms must be submitted promptly, whether the remarks are complimentary or not. Remember, a supplement to the Handbook, *Manual for FSS Personnel and Instructors,* has all the details for anyone associated with planning a school or symposium and is available from NGC Member Services.

Another frequently heard lament is about how difficult it is to financially afford to sponsor a school series or a symposium. Several regions have solved that problem by rotating the responsibility among the states on successive years. If travel is a consideration, judges can look ahead and plan to attend the one closest to them. Even when it is not feasible to include the entire region, if a large state is planning a symposium in one corner, it can notify the adjoining states nearby and collectively support the endeavor with both resources and attendees. Just as holding a flower show is not a one-person effort, neither should sponsoring a school or symposium be the work of only a single group. Besides, widening our circle of acquaintances and exchanging ideas help us to grow. Current lists of Approved Instructors, Flower Show Schools Committee, State Flower Show Personnel and up-to-date forms are available on the website. To ensure prompt attention, be sure you are sending the current form to the correct chairman.

—Dorthy Yard, NGC Flower Show Schools Chairman

*For winter’s rains and ruins are over,*
*And all the season of snows and sins;*  
*The days dividing lover and lover,*  
*The light that loses, the night that wins;*  
*And time remembered is grief forgotten,*  
*And frosts are slain and flowers begotten,*  
*And in green underwood and cover*  
*Blossom by blossom the spring begins.*

~Algernon Charles Swinburne, 1890
Center for Plant Conservation and San Diego Zoo Global Announce New Partnership

San Diego Zoo Global, a world leader in animal conservation, has recently partnered with the Center for Plant Conservation, the leading national conservation association of 40 botanical gardens, arboreta, and other similar organizations working to conserve the most imperiled plants of the United States, Canada, and beyond. Formerly based in St. Louis, Missouri, at the Missouri Botanical Garden, the CPC’s National Headquarters has recently been moved to San Diego, California, where it is now based at the San Diego Zoo Global’s Institute for Conservation Research. Through this unique new collaborative effort, San Diego Zoo Global and the Center for Plant Conservation have partnered to advance plant conservation in line with SDZG’s vision to lead the fight against extinction.

—John Clark, president of the Center for Plant Conservation and director of plant conservation for San Diego Zoo Global; http://www.centerforplantconservation.org

NGC Roster Changes
2015-2017 Board of Directors

Chairmen
Conventions and Fall Boards Committee
Add: 2017 Fall Board Meeting – St. Louis, MO
Chairman, Jackie Reynolds, 452 Foreston
Place, Webster Groves, MO 63119-3927; Jreynolds452@charter.net

Vice-Chairman, Mary Davidson-Officer, 2359 South 12th Street, St. Louis, MO 63104; maryofficer@sbcglobal.net

Crowns Bees
Chairman, Jacqueline Lee Connell, 435 S. Gulfstream Ave #806, Sarasota, FL 34236; ctgdns1113@gmail.com

Environmental Concerns/Conservation Committee
Bees (Crowns Bees), Jacqueline Lee Connell, 435 S. Gulfstream Ave #806, Sarasota, FL 34236; ctgdns1113@gmail.com

Environmental Studies Schools Committee
ESS Accrediting (NE,C,SA,DS)
Delete: Judy Morley (resigned)
Add: Patricia A. Ruipiper, 5580 Jeffries Court, Westerville, OH 43082-8013; patrupiper@gmail.com

Gardens Committee
Coordinator/Arboreta/Public Gardens Chairman
Delete: Gail Hill (no replacement at this time)

IA Membership
IA Membership Committee, Susana Schiaffino, Azucena villafior 450, Torre boulevard pico 37, depot 1. Código postal 1107 (CABA), Buenos Aires, Argentina; sschiaffino@yahoo.com

Leap Into Leadership — Leadership Development
Delete: Committee, Betsy Smith (resigned)

Membership Committee
Delete: Committee: Gail Hill (no replacement at this time)

The butterfly counts not months but moments, and has time enough.
~Rabindranath Tagore

The country habit has me by the heart,
For he’s bewitched forever who has seen,
Not with his eyes but with his vision, Spring
Flow down the woods and stipple leaves with sun.
—Vita Sackville-West
Environmental Studies Schools

Course I
Noxubee Refuge, Brooksville, MS . April 26-27
School Chairman: Melanie Gousset, 835 Rolling Oaks Drive, Grenada, MS 38901; 662-226-9666; mgousset@cableone.net

West Palm Beach, FL . . . . . . . . . . .May 19-20
Local Chairman: Nancy Richards, 934 Cypress Drive, Delray Beach, FL 33483; 561-702-0550; nancyrichards@gmail.com

Normandy Park, WA . . . . . October 11-13
*State Chairman: Lana Finegold, 1414 179th Ave NE, Bellevue, WA 98008; 425-747-5742; lanafinegold@msn.com
*Co-chair and contact person: Linda Haas; lindahaas@comcast.net

Holland, MI . . . . . . . . . . October 15-17
State Chairman: Rita Crawley; 734-529-2907

Derwood, MD (NCA) . . . . . November 3-4
State Chairman: Lydia Barbour, 717 Kings Lane, Fort Washington, MD 20744; 301-203-6696; lydiabarbour@hotmail.com

Lowell, MA . . . . . . . . November 3-4
State Chairman: Leigh Cameron, 130 Stonebridge Drive, Dracut, MA 01826; 978-703-0813; leighb.cameron@gmail.com

Course II
Noxubee Refuge, Brooksville, MS . April 28-29
State Chairman: Melanie Gousset, 835 Rolling Oaks Drive, Grenada, MS 38901; 662-226-9666; mgousset@cableone.net

Course III
Jacksonville, FL . . . . . . . . . . June 21-22
State Chairman: David Farah, 621 Casa Fuerta Lane, St. Augustine, FL 32656; 904-460-4663; dfarah@gmail.com

Black Bayou, Monroe, LA . . . August 16-17
State Chairman: Jean Gilstrap, 161 Donna Drive, Farmerville, LA 71241; 318-680-1984; jeangilstrap@gmail.com

Course IV
Put-in-Bay, OH . . . . . . . . . . . . . . . . June 13-14
Registrar: Sandy Rogers, 11075 Bobko Blvd., Parma, OH 44130; 440-487-5328; srogers@ameritech.net

Black Bayou, Monroe, LA . . . August 18-19
State Chairman: Jean Gilstrap; 318-680-1984

Environmental Refresher
Vidalia, LA . . . . . . . . . . . . . . . . April 11 & 13
Chairman: Jean Gilstrap, 161 Donna Drive, Farmerville, LA 71241; 318-368-8189; jeangilstrap@gmail.com

The National Gardener

Winter Issue - Jan-Feb-Mar
Will be mailed January 1

Spring Issue - Apr-May-June
Will be mailed April 1

Summer Issue - July-Aug-Sept
Will be mailed July 1

Fall Issue - Oct-Nov-Dec
Will be mailed October 1

Deadline
for the Summer Issue
Copy due by May 1, 2016

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Flower Show Symposia

East Windsor, NJ . . . . . . . . . . . . . . May 17-18
Local Registrar: Jane Bercsh, 386 Tavistock Drive, Medford, NJ 08055-9261; 609-654-6580; janebersch@aol.com

Boise, ID . . . . . . . . . . . . . . . . . . . . . May 19-20
Local Registrar: Pat Baker, P.O. Box 140557, Boise, ID 83714; 208-870-1299; patbaker@live.com

Little Rock, AR . . . . . . . . . . . . . . June 23-24
Local Registrar: Judy Sheets; 573-760-4252

Grand Rapids, MI . . . . . . . . . . . . . August 17-18
Local Registrar: Lynn Dinvald, 6802 Springbrook Lane, Kalamazoo, MI 49004-9665; 269-343-3827; Ydoubleline@aol.com

Winston-Salem, NC . . . . . . . . . . . . . August 21-23
Registrar: Trish Sumners, 194 Sonata Dr., Lewisville, NC 27023; 336-945-4433; brssmm@yahoo.com

Nashville, TN . . . . . . . . . . . . . . . . . . August 22-23
Registrar: Kathy Rychen; 615-406-5716

Independence, OH . . . . . . . . . . . . . September 13-14
Registrar: Janice Koster, PO Box 802, Burton, Ohio 44021-0802; 440-669-8531; j.koster@sbcglobal.net

Sumter, SC . . . . . . . . . . . . . . . . . . . . October 5-6
Local registrar: Jerry Weise, 1507 Lorenzo St., Mt. Pleasant, SC 29464; 843-884-8998; jerrywbwb@juno.com

Saratoga Springs, NY . . . . . . . . . . . . . October 26-27
Registrar: Laura McLaughlin, 315 Lakeview Avenue West, Brightwaters, NY 11718-1712; 631-666-0029; laurakingmclaughlin@gmail.com

Tampa, FL . . . . . . . . . . . . . . . . . . . . . November 5-7
Registrar: Christy Linke; 813-752-8392

Richmond, VA . . . . . . . . . . . . . . . . . . November 9-10
Registrar: Brenda McManaway, 5531 Bethelhem Rd, Boones Mill, VA 24015-3231; 540-580-3838; brendamc@shentel.net

Flower Show Schools

Course I
Grove City, PA . . . . . . . . . . . . . . . . . . . August 24-26
Registrar: Cindy Jarzab; 814-726-2924

Course II
Midland MI . . . . . . . . . . . . . . . . . . . . . . April 19-21
Local Registrar: Alice Mesaros, 3893 Hilltop Road, Onekama, MI 49675; 989-710-0441; alicemesaros@yahoo.com

Course III
Huntington, WV . . . . . . . . . . . . . . . . . . . April 20-22
Registrar: Kathy Copley, 313 Tenth St., Huntington, WV 25701; 304-637-2877; kjrc@aol.com

Weldon Springs MO . . . . . . . . . . . . . . . . . June 28-30
Local Registrar: Sheri Menscher, 1020E, Hwy N, Wentzville, MO 63385; 573-760-4252; sherimensch@aol.com

Port St. Lucie, FL . . . . . . . . . . . . . . . . . . November 1-3
Registrar: Michele Myers, 152 Seabreeze Avenue, Palm Beach, FL 33480-6127; 561-655-7957; m.s.myers@msn.com

Course IV
Denver, CO . . . . . . . . . . . . . . . . . . . . . . May 16, 17 & 20
Registrar: Louise Niekerk, 713 Mouning Dove Lane, Golden, CO 80401-0911; 303-278-3523; lniekerk@comcast.net

Rochester, NY . . . . . . . . . . . . . . . . . . . June 8-10
Registrar: Patsy Moran; 585-265-2672

Little Rock, AR . . . . . . . . . . . . . . . . . . . June 14-16
Registrar: Jo Krallman, 4714 Pine Drive, Benton, AR 72019-9196; 501-847-9171; krallman@sbcglobal.net

The 2017 VISION of BEAUTY calendars are now available at: www.gardenclub.org or by calling Gabby, at
NGC Member Services: $6.75 each, includes shipping $5.00 (2 - 49 copies), plus S&H $4.50 (50 - 99 copies), plus S&H $4.00 (100 - 999 copies), plus S&H
Spring 2016

Gardening Study Schools

Course II
Miramar, FL .................... April 12-13
State Chairman: Marylou Ruiz; 305-822-2717

Chattanooga, TN ................ September 27-28
Local/State Chairman: Maggi Burns, 8258 Chula Creek Rd., Chattanooga, TN 37421-3283; 423-499-9751; maggifgc@epbf.com

Course III
Ames, IA ......................... April 7-8
Local/State Chairman: Ada Mae Lewis, 122 N. Russell Ave., Ames, IA 50010; 515-232-0608; adamaelewis@gmail.com

Boylinston, MA ............... April 7-8
Local/State Chairman: Linda Jean Smith, 23 Bentley Lane, Chelmsford, MA 01824; 978-256-3101; lindajean.smith@comcast.net

Kearney, NE .................... April 9 & 30
Chairman: Alice Hemsath, 110 East 39th St E-1, Kearney, NE 68847; 308-224-3771; dhemsath@charter.net

Traverse City, MI .......... April 11-12
*Local Co-Chairman: Nancy Collard, 903 Valley View Dr., Traverse City, MI 49685; 231-943-8697; handymama@chartermi.net
*Local Co-Chairman: Terry Harding; wsharding@chartermi.net

Bedford, PA .................. April 26-27
Local Chairman: Micki McCahan, 428 Grove Lane, Bedford, PA 15522; 814-623-6590; micnmini@embarqmail.com

Fairfax, VA (NCA) ........ June 1-2
Local/State Chairman: Joyce Skoglund, 3415 Country Hill Drive, Fairfax, VA 22030; 703-591-4017; jeskog612@gmail.com

Madrid, IA .................. September 15-16
State Chairman: AdaMae Lewis; 515-232-0608

Tri-Refreshers
(ESS, GSS, LDS)
Spencer, IN .................... April 11-13
Event Chairman: Edie Dyer-Wilson, 3852 East 300 North, Sullivan, IN 47882; 812-397-2619; wowedie@aol.com

Columbus, OH ................. June 7-8
Event Chairman: Pat Rupiper, 5580 Jeffries Court, Westerville, OH 43082; 614-423-8646; patrupiper@gmail.com

Portland & Bar Harbor, ME . September 25-27
Event Chairman: Mary Ericson, 36 Lord Rd., Lebanon, ME 04027; 207-457-2188; travilr@metrocast.net

There is always something to make you wonder in the shape of a tree.
~Albert Schweitzer

Landscape Design Schools

Course I
College Station, TX ................ September 26-27
State Chairman: Diane Perez; 713-984-1901

Kalamazoo, MI .................. October 24-25
State Chairman: Terry Harding; 231-947-0568

Phoenix, AZ .................... November 12-14
State Chairman: Joyce Girvin, 70 Box Canyon Road, Sedona, AZ 86351; 928-284-4263; cell phone: 774-217-8253; joycegirvin@gmail.com

Course II
Morgantown, WV .................. May 18-20
State Chairman: Donna L. Davis, 64 Bryant Davis Lane, St. Marys, WV 26170; 304-684-3136; dadodavis@frontiernet.net

Course III
Virginia Beach, VA .................. April 6-7
State Chairman: Glenda H. Knowles, 6948 Chancery Lane, Williamsburg, VA 23188-7567; 757-345-6618; ggknowles@cox.net

Annapolis, MD .................. April 26-28
State Chairman: Diana Bonner, 324 Columbia Lane, Stevensville, MD 21666; 410-643-6779; debonner@verizon.net

Wellesley, MA .................. October 27-29
State Chairman: Maureen O’Brien; 781-407-0065

New Smyrna Beach, FL ................. November 9-10
State Chairman: Sally Flanagan, 312 Gleneagles Drive, New Smyrna Beach, FL 32168; 386-428-3170; sfflan@aol.com

Course IV
Santa Rosa, CA .................. April 28-29
State Chairman: Alexis Slafer, 6111 South Kings Road, Los Angeles, CA 90056-1639; 323-292-6657; cell phone: 323-708-4114; aslafer@ca.rr.com

Canton, OH .................. July 27-29
State Chairman: Pat Smith, 822 Sandlot Circle, Louisville, OH 44641; 330-875-9317; playnlearn345@aol.com

Sarasota, FL .................. November 16-17
State Chairman: Karen Gott, 3040 NE 9th Avenue, Pompano Beach, FL 33064; 954-532-5600; cell phone: 954-295-7205; kgott1219@comcast.net

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Audubon in Action

How the CBC Can Help Save Birds in Cuba
by Janice Lloyd

The century-old citizen science project is just in its fifth year in Cuba.

Each year, more than 72,000 volunteers spend parts of December and early January counting birds across the Americas for Audubon’s Christmas Bird Count (CBC), a citizen science project that tracks bird populations. In many places, counts have been going on for more than a century—but in Cuba, this year marked just the fifth time such counts have been conducted by Cuban birders themselves.

Cuba is a fantastic place to conduct a count—the country’s varied terrain, ranging from grasslands and lagoons to rain forests and cloud forests, supports 371 species and 28 endemic to Cuba—more birds than any other Caribbean island. Though U.S. personnel at Guantanamo Bay conducted a count for several seasons in the 1970s, they left the island and birds went uncounted for decades.

Then, in 2011, Robert Norton, a Gainesville, Florida, biologist who reviews CBC data for Audubon and leads several counts in the West Indies, met several Cubans at a meeting of the Society of Caribbean Ornithologists, in the Bahamas. He encouraged them to start a count, and joined them to assist, gaining access to Cuba via a People to People license as a trip leader. (He got this visa via his employer, Holbrook Travel, which sponsors the counts.)

The work helps identify bird-rich areas in the country, a boon to American tourists and birders anxious to visit now that travel restrictions have eased. It could also provide support for Cuban conservation scientists who have been working with limited resources for years to preserve species and habitat (this year, Norton’s team brought donated, hard-to-find gear, including a spotting scope, pair of binoculars, and trail cameras, for local scientists). “Cuban scientists and conservationists deserve much credit for designing a national park system that protects representative samples of the country’s biogeographic regions,” says John Myers, Latin American Program Director for Audubon’s International Alliances Program. Myers commended the efforts to expand CBCs in Cuba, noting that they’d likely bring data that is increasingly important in the face of climate change.

©Audubon.org. To read the full article, go to the link: audubon.org/cubabc

—Janice Lloyd is a freelance writer, part-time English teacher and member of the Audubon Society of Northern Virginia. Her passion for birding started at a young age. She has listed 80 bird species in her wooded yard in Northern Virginia.

The roofs are shining from the rain,
The sparrows twitter as they fly,
And with a windy April grace
The little clouds go by.
Yet the back yards are bare and brown
With only one unchanging tree--
I could not be so sure of Spring
Save that it sings in me.
~Sara Teasdale, April
A Sensory Garden, with therapeutic features for children with autism, was built by the Terrebonne Garden Club, in Houma, Louisiana. The location of the garden is at Stella Learning Center for Autism. It is a school for special-needs children with autism, which is a spectrum disorder that disrupts neurological processing and impacts all areas of a child’s life.

Daisy Alviar, Executive Director of Stella Learning Center, said this about the garden: “Our Center provides services for children with Autism and related disorders. Generally, our students have sensory processing disorders. They tend to have extreme reactions to sensory stimulation in that they are either stimulated too much or too little. For us, the garden is therapeutic. We use it as a calming place. Immersed in the scents, textures, and colors of plants, it is a gentle way for our students to stimulate their senses. While in the garden, they are encouraged to touch, smell, taste, and generally interact with the environment around them.”

Psychiatrist Dr. Michelle Simon, a local doctor and parent of one of the students, was active in the planning, development, and installation of the garden. She made the following statement: “My son, Thomas, has been at Stella Learning Center for almost three years. He is now 15, and is still nonverbal. One of his challenges is sensory overload, and at Stella they have learned to help him calm down by changing his environment when he becomes overstimulated. He loves to be outside and the Sensory Garden has given him a place to sit and relax when he feels overwhelmed. By using his communication device, he often asks to go outside into the Sensory Garden.”

The Terrebonne Garden Club has transformed a 23 ft. by 21 ft. underutilized space, adjacent to the sensory classroom, in a metal building, into a therapeutic garden. This project is in line with one of the stated missions for National Garden Clubs and Terrebonne Garden Club: “To promote civic and environmental responsibility.” What better way to give back to a community, than the support of special-needs children.
Because design of outdoor spaces are fundamentally sensory based and rely on plant material to enhance the experience, it is a natural progression to design a garden for sensory stimulation of special-needs children. The Terrebonne Garden Club relied on multi-disciplinary sources for designing, creating, and installing the Sensory Garden.

A well-designed Sensory Garden can serve many functions, such as teaching, socializing, healing, and horticultural therapy.

The Sensory Garden creates a stimulating journey through the senses, heightening awareness and brings positive learning opportunities. The design features plants and accessories that will provide experiences for seeing, smelling, hearing, touching, and tasting. One of the objectives of this Sensory Garden is to encourage the students to interact with the plants, breaking off leaves to smell and taste. The Garden has already provided many positive physical, cognitive, sensory, emotional, and social benefits, while getting the children out into the garden. The Sensory Garden has helped to reduce feelings of anxiety, provides an outlet for physical aggression, and builds self-esteem from nurturing the plants. For the children with disabilities, a wide variety of choices gives them a sense of control over themselves and their environment, ultimately empowering them toward more self-confidence. This

Above: Work is just beginning; at right: Garden club members are planting Lambs Ear (Stachys byzantina) and Liriope muscari.
unique space, which is engaging to the children, offers a fun, safe, and secure outdoor play and learning environment.

The Sensory Garden design was developed by Danielle Duhe, a landscape design architect employed with Dana Brown Associates. Danielle’s professional challenge was: “To create a space that was calming, while also having enough variety of plant material to be stimulating.”

Physically, the garden is comprised of several areas. A brightly painted concrete pad provides a place for the children to relax on the benches, tables, and chairs. The space also gives the opportunity for teachers and aides to step aside and allow the children to experience the environment, while remaining vigilant. The paver stone pathway divides the planted areas and is designed to improve students’ motor skills. The water feature brings sounds and movement, as well as water to the garden. The sound of falling water and the cooling effect of spray and evaporation both provide important psychological and emotional values to the outdoor space. The area is completely fenced to provide a safe and secure environment. Plant materials provide both calming and stimulating tactile, visual, auditory, and olfactory sensations from the various textures and fragrances. Plant materials were chosen that have the ability to attract butterflies and birds. In addition to the plant schedule shown on the Houma Sensory Garden design, the following plants were also utilized: Stachys, Rosmarinus officinalis, Rumohra adiantiformis, Coleus, Petunia, Monarda didyma, Nandina domestica, and Lirope muscari.

A garden becomes “Special” when it brings a smile to the face of a “Special Child.”

—Mary Jane Peters, NGC LDS Accrediting Chairman (SC, RM, P)

Plantings include a multifloral-type Petunia that is heat-tolerant and surprisingly fragrant and a pink Floribunda Rose, ‘Sexy Rexy.’
Protecting our Pollinators

by Harvey Cotten

As each of us ponders the concept of Reconciliation Ecology, we grapple with the idea of what can we do, both individually as gardeners and even collectively as a group or club, to incorporate the principles of this movement into our daily lives and habits. For me, the plight of our pollinators, whether they are bees, butterflies, or hummingbirds, is a situation that needs our undivided attention and, fortunately for us, each of us individually has the power to affect the plight of these amazing and important creatures.

One cannot help but read about the plight of the honeybee in the press—wherever you look whether it is gardening magazines or national media outlets, the honeybee has been in the news. For many years we have read reports of declining numbers of bees and what that would mean to our food supply. Honeybees account for the pollination of one-third of the food we eat each and every day, therefore the declining number of bees could have a detrimental effect on the food produced, whether by big agriculture or backyard gardeners. Many theories have been put forward for the reasons for this decline and, sadly, there is no one answer to this phenomenon. One thing we can conclude is that it is a multitude of factors that contribute to the decline of bees, including loss of forage habitat, queen failure, parasites, diseases, pesticides, and genetic weakness. By far, pesticide use has garnered the most attention, and for good reason. Pesticides, specifically insecticides, are developed to kill insects, and bees are insects. Therefore, it is imperative that we,

Above: A bumblebee pollinating milkweed. At right: A honeybee covered with pollen.
as gardeners, act responsibly in our use of pesticides as it relates to pollinators in general and bees in particular.

I believe that each of us should adopt the use of IPM (Integrated Pest Management) as we try and control pests in our garden. Planting species that are pest and disease resistant and using biological, organic, or cultural controls first before resorting to insecticides are the best management practices to follow. Whenever one must resort to insecticide use in the garden, read and follow label directions meticulously, paying particular attention to time of spraying and spraying when plants are in flower.

While we have the responsibility to use pesticides correctly, we also have the ability to promote pollinator health in a positive way by planting forage plants for our bees and butterflies. One major factor in the decline of bee and butterfly populations has been the loss of habitat that these pollinators use to forage and sustain themselves. Whether it is urban/suburban sprawl or increased agricultural use, bees and butterflies have lost tremendous amounts of land that can provide nourishment for these pollinators. Planting nectar sources in our gardens is a simple and easy thing for each of us to do and it will have an immediate impact on pollinator health.

Nectar plants come in all shapes and sizes from trees, shrubs, annuals, and perennials, with the most important trait being having something in bloom throughout the whole year. We as gardeners desire to have a beautiful garden throughout the year anyway, so having plants that serve a dual purpose of providing color and beauty for us while providing nectar for our pollinators is a win-win situation. Pay particular attention to using native plants in your landscape—these are plants that have provided nectar sources for years, and then augment your plant palette with other nectar-producing plants to insure all your pollinators have plenty to feed upon. Many books list the best pollinator-attracting plants; or use your local Cooperative Extension office to provide a list of pollinator-friendly plants for your landscape. One excellent resource is the Pollinator Partnership (www.pollinator.org), which provides extensive plant lists for many different areas of the country.

This emphasis on pollinator health has reached a national crescendo, especially with the White House joining the fight. Last year, they launched the National Task Force on Pollinator Health emphasizing improving habitats for honeybees and Monarch butterflies. An offshoot of this program is the launch of the Million Garden Pollinator Challenge (www.millionpollinatorgardens.org) where the goal is to plant and register one million gardens, regardless of size, across the country, which will support pollinator health. Whether it is a container garden or a window box, a hanging basket or a large park or meadow, pollinator gardens need
to be an integral part of each of our landscapes. I encourage each of you, both as an individual gardener or as a club, to join the challenge. Plant a garden, register your site, and watch these beautiful pollinators flourish in your beautiful landscape.

—Harvey Cotten is a garden writer, designer, and consultant.

After 22 years with the Huntsville Botanical Garden, most recently as vice president and chief horticulturist, he retired in 2014. He continues to present workshops for the Botanical Garden and for Master Gardener Associations, while lecturing across the southeast on various garden topics.

He is active in the Green Industry and has held or is holding offices on the boards of the Alabama Invasive Plant Council, the Alabama Nursery and Landscape Association, and the Horticulture Research Institute.

He earned a Bachelor of Science in Ornamental Horticulture from Mississippi State University. He was general manager of Monmouth Plantation in Natchez, Mississippi, and co-owner of Chase Nursery Co., in Huntsville.

Bird Flowers

The flowers that are visited by birds and hummingbirds are typically:

- Tubular and have petals that are recurved to be out of the way.
- Have tubes, funnels, cups.
- Strong supports for perching.
- Brightly colored: red, yellow, or orange.
- Odorless (birds have a poor sense of smell).
- Open during the day.
- Prolific nectar producers with nectar deeply hidden.
- Modest pollen producers that are designed to dust the bird’s head/back with pollen as the bird forages for nectar.

Hummingbirds have very good eyes and are extremely attracted to red. They thrust their long slender bills deep into the flowers for nectar, withdrawing faces dusted in pollen.

Although a hummingbird weighs between two and eight grams (a penny weighs 2.5 grams), they eat frequently in order to power hearts that pump 1,200 times per minute and wings that beat seventy times each second. To survive, they must eat several times their weight in nectar everyday! For protein, they supplement their sugary diet with small insects.

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