



The Seed 2018

Nebraska Statewide Arboretum

Planting Nebraska for healthy people, vibrant communities and a resilient environment

Why we love birds

Justin Everton, Green Infrastructure Coordinator

Birds and boys with BB guns don't mix well. Growing up on the farm in western Nebraska in the 1970s, my four brothers and I all had BB guns. When we weren't shooting at beer cans or each other (yes, we were stupid enough to do that) we were often shooting at birds. I hate to say it, but we killed a lot of sparrows, pigeons and barn swallows as well as a few killdeer, meadowlarks and kingbirds. We became pretty good shots. Which wasn't a good thing.

Looking back now, I cringe at what we did. I remember our grandmother telling us to quit shooting the birds as we headed out the door with our guns. We didn't listen and we didn't realize that we were likely changing the ecosystem of the farm in a bad way. At the peak of our BB-shooting prowess, the bird population at the farm fell significantly. The birds learned to stay away. Fewer birds likely meant more mice, grasshoppers and other undesirable pests—and much less enjoyment from just having them around. I wish we would have listened to our grandmother.

Fast-forward to today and although I'm VERY tempted to take out some of those pesky starlings that invade my birdfeeders each spring, the only bird hunting

I do now is with binoculars. As with other birders, I've started keeping a life list and I'm now up to about 50 different species that I've seen, many of which were in my own backyard. Although my list pales in comparison to those of avid birders, it does reveal how diverse a bird population can be even within a town.

Some of my favorite backyard birds include the black-capped chickadee, white-breasted nuthatch, brown creeper, orchard oriole and various woodpeckers. It's also quite a sight to see a large cooper's hawk hanging out in the yard looking for a meal. It can have all the starlings it wants! Although I'm no Jason St. Sauver, the "Birdnerd" of Spring Creek Prairie Audubon Center (see his article in this issue), I'm happy to be considered a budding bird nerd.

Birds are certainly fun to watch, but they're also fun to listen to with their amazing variety of songs and calls. One of my favorites is the two-tone call of the black-capped chickadee—high and then low. Another good one is the melodic notes of the cardinal in late winter signaling that spring is on the way. I swear I can hear him singing "give it here" within those notes.

For years while working in my backyard I wondered what the gurgling noise



INSIDE

Birds Matter	2
Fontenelle Forest	3
At Home in the City	4
Best Plants for Birds	6
Some of Our Favorite Birds	8
Birding with Kids	10
Birds by the Numbers	10
Bird Habitat, Resources	11

Birds Matter

and not just during the Year of the Bird



Jason “the Birdnerd” St. Sauver, Community Education Director at Spring Creek Prairie Audubon Center

Boldly patterned bobolinks. Grand greater prairie chickens. Amazing aerial vocalists like Sprague’s pipits and of course, our beloved eastern and western meadowlarks. They’re all birds of the Nebraska prairie and, while the prairie is important to them—for home and habitat, food and fledging—they are important to us. During this Year of the Bird, let’s look a little closer at our disappearing grassland species and not only celebrate them, but step up and save them.

Since the earliest painters and writers, people have been depicting and writing about birds. Longing to soar with them; to share the sky with them, if only for a moment. We come close in our jets but with much less grace and so much more wasted power.

We marvel at their migratory prowess, somehow finding their way year after year after year through storms and droughts, many times returning to find their homes and habitat destroyed after traveling astounding distances to return to them. For example, the bobolink—a prairie parcel specialist—flies over 12,000 miles round trip to breed here and

then winter in South America.

We go wide-eyed and warm investigating a feather up close, astounded by the tiny hooks and barbs that retain its shape, realizing we have something (our fingers and toenails) in common with these amazing structures. And we take joy and comfort in watching them along the trails of places like Spring Creek Prairie, Nine Mile Prairie or Pioneers Park Nature Center.

And yet... we are still letting many species go extinct. We are allowing important habitat to be lost to development and necessary water and soil to be polluted. We allow our cats outdoors even though we have feeders right next door, or possibly even in our own yards. (Notice here I said “our”; I’m far from perfect.)



But I ask this: If you have seen a prairie chicken dance, can you ever imagine saying to your child or grandchild, “Wow! I wish you could have seen a prairie chicken. They were so amazing.” Can you fathom having to tell your nieces and nephews or the schoolchildren you teach, “The common loon had one of the most beautiful and haunting songs ever heard in nature. I wish you could have heard it.” I hope not.

Birds matter. Not just to the natural balance of things, but to our souls... to our humanity. Research shows that a shut-in senior or a soldier suffering from PTSD finds joy and healing in watching a feathered friend frolic in a bird bath or soar by their window. And it’s not just birds, but all of our outside natural world. The trees and shrubs the birds perch on and nest in matter. The insects and berries they eat matter.

So, for the rest of 2018, to celebrate the Year of the Bird, why not take that extra step. To help the diminutive grasshopper sparrow keep singing on our Nebraska prairies—consider using less plastic. To keep stamping and dancing grounds for prairie chickens across the state, support a local conservation organization by volunteering with a community science project. And plant native plants. Our birds depend on them and we, whether we know it or not, depend on our birds—to make us smile, to move our souls, and to make every year the year of the bird.



Top to bottom, photos by Jason St. Sauver: western meadowlark; bobolink; northern bobwhite.

“In order to see birds it is necessary to become part of the silence.”
Robert Lynd

Fontenelle Forest— Important to Birds, Birders

Michaela E. Johnson and Jeanine Lackey,
Fontenelle Forest www.fontenelleforest.org

Fontenelle Forest boasts over 2,000 acres of bird habitat along the Missouri River migratory flyway, nestled at the edge of Omaha and Bellevue as well as in Ponca Hills north of Omaha. The National Audubon Society recognizes it as an important bird area (IBA). With its extensive oak woodland/savanna restoration efforts and the vast floodplain, marsh and wetlands, the preserve provides a wide array of support for common and vulnerable species. As the oak woodland/savanna restoration progresses, the bird communities are experiencing the benefits.

Nebraska Game and Parks Commission identifies two Tier I at-risk bird species for the Missouri River, the cerulean warbler and the wood thrush, both of which are found at Fontenelle Forest. Fragmentation and degradation of quality habitat has contributed greatly to the decline of these birds. However, as ridgelines are opened up for more optimal oak regeneration, it provides more ideal hunting and breeding grounds for beloved birds like the cerulean warblers and American kestrels, which prefer old growth forests with little undergrowth. Meanwhile, the hollows retain a shrubby characteristic with their dense understory of redbud, ironwood and serviceberry, which provide the ideal habitat for the wood thrushes.

Additionally, Fontenelle Forest was identified by *Birder's World* magazine as one of the 10 best places in America to bird for warblers, for it supports 35 species of warblers. Past president of the Nebraska Ornithologists' Union, Clem Klaphake, wrote in *Bird Watching Daily* about notable sightings of hooded warblers, cape may warblers, bay-breasted warblers and white-eyed Vireos.

The oak restoration efforts also mean that historical and often rare native wildflowers and grasses are able to re-establish themselves, while the impact of invasive plants is reduced. Fontenelle sits on a thick layer of loess soil, found only here along the Missouri River and

in China; the result is a biologically unique landscape which supports an extraordinary composition of plant and animal life.

These healthy native plant communities in turn support the insect communities consumed by bird populations, especially because oak trees support more butterfly and moth species than any other native or non-native tree species. During oak mast years, acorns are a favorite and staple food source for numerous bird and wildlife species and can provide abundant winter forage.

Beyond the upland woods, the floodplains along the Missouri River provide valuable stopover habitats for migratory shorebirds and wetland species. American pelicans, green herons, soras, prothonotary warblers, numerous duck species and greater and lesser yellowlegs can all be seen from the lowland trails.

Fontenelle's Raptor Woodland Refuge both provides a home for non-releasable injured raptors and facilitates public education and outreach. In comfortable dens visible to the public are ospreys, northern harriers, peregrine falcons, swainson's hawks, American kestrels and many more. The raptor programs expose 20,000 people a year to a better understanding and a closer look at some of our native birds. In conjunction with Fontenelle Forest's Raptor Recovery and with the help of trained veterinarians, they work to rehabilitate injured or orphaned eagles, falcons, hawks and owls.

This commitment to public outreach has fostered new generations of birders, conservationists and raptor recovery volunteers that can be leaders in ornithological conservation; all of whom help Fontenelle Forest be the incredible bird conservation hotspot that it is today.



Young barn owl and recently thinned oak woodland at Fontenelle Forest; photos by Jeanine Lackey.

Photo of red-headed woodpecker in a bur oak tree; photo by Josh Preister.

At Home in the City

Vintage Heights Offers Habitat for Birds



Dan Wheeler, Professor Emeritus of Leadership Studies at the University of Nebraska-Lincoln, works to increase habitat for birds at his home and neighborhood.

We rarely think of urban areas as good places for birdwatching. But several years ago Lincoln's Vintage Heights Homeowner's Association began working to increase habitat diversity in its 40-acre commons area. The Nebraska Statewide Arboretum and University of Nebraska

Landscape and Natural Resource specialists helped us develop a vision and a management plan. This area within the Lincoln city limits now has over 80 species of birds.

The commons area of Vintage Heights parallels Antelope Creek and the Billy Wolfe Trail. It includes a wetland at the south end, some open fields and a major strip of old cottonwoods along each side of the creek.

The stand of massive cottonwoods 80 feet high provides shelter and food for four species of woodpeckers, white-breasted nuthatches, mourning doves, red-eyed vireos, rose-breasted grosbeaks, northern orioles and many others. The understory of smaller trees and wild plums provides great habitat for cardinals, blue jays, robins, brown thrashers and various sparrows. The creek provides drinking water and places for baths.

Additionally we planted some oaks, which attracted the first red-headed woodpecker we've seen in 10 years, and some other large deciduous trees to replace cottonwoods which are slowly dying and being undercut by the creek. These giants provide cavities for woodpeckers and other cavity-nesting birds and animals. A pair of great horned owls helps control the rabbit population.

We further diversified habitat by planting an extensive pollinator greenway in an open area west of Mendoza Park. It now hosts birds associated with prairie:

eastern bluebirds (bird houses provided), eastern and western kingbirds, dickcissels, tree and barn swallows and prairie sparrows. This summer, with the many pollinator plants we've added, we expect to see ruby-throated hummingbirds in August and September as they migrate south for the winter.

The wet area management has involved removal of unwanted trees that invade and will take over. Every year we remove redcedar and other trees that are choking the creek. This maintains habitat for red-winged blackbirds, tree swallows, eastern bluebirds and common yellowthroats (warblers). On the eastern upland side of the trail, we have planted many trees, both pines and deciduous, to provide shelter, food and nesting sites for other birds and wildlife.

As an affiliate of the Nebraska Statewide Arboretum, and at their encouragement, our Homeowner Association has planted more than 100 trees representing 46 different species. This diversity will continue to attract present and new bird species. Through the seasons, these plants are attractive to migrants in spring and fall, as well as winter and summer resident birds. Migrants include sparrows (especially white-throated, white-crowned and Harris's), thrushes, warblers and vireos. Many insect-eating birds stop over for a short time to feed and prepare to move north in the spring and south in the fall. The plan is to continue tree diversification.

Individual homeowners within the neighborhood further expand the diversity. My home borders the cottonwoods and we provide foods like thistle seed, peanuts, sunflower and safflower year-round. After more than 10 years of planting, the shrubs (primarily viburnums and dogwoods) and other things we have planted have



From top, photographybykeller.com:
northern flicker;
downy woodpecker;
yellow warbler;
red-bellied woodpecker.

become a major source of food, shelter and areas for nesting. Common birds include grackles, brown-headed cowbirds, Carolina and house wrens. One of our neighbors said that as he walks the trail he knows where our house is because the birds are so noisy.

When you're feeding birds, you have to expect an occasional cooper's or sharp-shinned hawk to take advantage of birds at the feeder—that's how nature's food chain works. Though the hawks are rarely successful, their presence restricts feeding for a period.

Mallards nest along the creek banks and a pair of wood ducks has used a nesting box for the last five years. For a few days when the ducks are deciding on the nesting site, they are high in the cottonwood trees (a duck in a tree is an amazing sight!) but once the female enters the box and lays eggs, she becomes very secretive. The male is seldom seen again. Adding more nesting boxes along the commons areas is a way homeowners can support this beautiful duck.

Our bird list, online at www.vintageheights.net, contains over 80 species. These natural creatures add beauty and interest in terms of color, pattern and song. To hear the melodious song of the brown thrasher makes every summer day special. We feel fortunate to have an area rich in diversity which, in addition to the birds, has mink, raccoon, opossum, red fox and skunk.

Vintage Heights provides a corridor of habitat within Lincoln to keep these living things a part of our lives. One of the reasons people like to live and play in the area is because of this diversity of plants and wildlife. Wherever you live, you might consider managing and developing habitat to provide food, shelter and nesting sites for our feathered friends.



From top, photographybykeller.com:
barn swallows;
cardinal;
eastern bluebird;
ruby-throated hummingbirds.

**“Birds are indicators of the environment—a sort of environmental litmus paper. If they are in trouble, we know we'll soon be in trouble.”
Roger Tory Peterson**

Spring & Summer

Many of the early spring-fruited trees are timed perfectly to help birds with the non-stop demands of feeding their young. And don't forget about insects. More than 95 percent of land birds feed insects to their young. Leaving fall litter for spring nesting will provide insects and larvae for ground-foragers like thrushes and native sparrows.



- Blackberry and raspberry, *Rubus*—attracts 63+ bird species
- Birch, *Betula*—pine siskin, sparrows
- Cherry, *Prunus*—grosbeak, northern flicker, white-throated sparrow
- Chokeberry, *Aronia*
- Chokecherry, *Prunus virginiana*
- Coralberry, *Symphoricarpos*—14+ species
- Cucumber tree, *Magnolia acuminata*—towhee and other ground-feeders
- Currant, *Ribes*—16+ species
- Dogwood, *Cornus*—especially native roughleaf dogwood
- Elderberry, *Sambucus*—red-headed woodpecker, eastern bluebird, cardinal
- Juneberry or serviceberry, *Amelanchier*—one of the best early foods for a wide range of birds
- Maple, *Acer*—cardinal, bobwhite, grosbeak
- Mulberry, *Morus*—robin, cedar waxwing, cardinal
- Oak, *Quercus*—turkey, bobwhite quail, bluejay, rufous-sided towhee

Prairie & Other Perennials

- Aster* or *Symphotrichum*
- Coneflower, *Echinacea* or *Rudbeckia*
- Coreopsis*
- Goldenrod, *Solidago*
- Ironweed, *Vernonia*
- Joe-pye plant, *Eupatorium* or *Eutrochium*
- Lespedeza*
- Rattlesnake master, *Eryngium*
- Sunflower—*Silphium*, *Helianthus*, *Heliopsis*. Includes prairie dock, rosinweed, compass, cup plant...



A Seasonal Best Plant



Not Just Any Berry

- Birds need high-fat, high-carb foods in fall, either for migration or to survive harsh winters. Appropriately the native berries that ripen late season—black raspberry, elderberry, chokeberry, chokecherry, rough-leaf dogwood—are some of the most nutritious and contain 30-50 percent fat.
- By contrast, non-native fruits from multiflora rose, Amur honeysuckle and autumn olive contain just 3-4 percent fat. And birds may not recognize or eat them, even when they're hungry.
- Species that don't migrate, like cardinals and woodpeckers, depend heavily on winter berries.
- Cardinals and native sparrows crush berries before swallowing, so they can eat larger berries.
- Robins and bluebirds eat berries whole and then spit out seeds, ultimately replanting some of their favorite foods.
- Robins, bluebirds, cedar waxwings and mockingbirds aren't able to hull seeds with their bills, so they're very dependent on berries.
- Persistence makes a difference. Honeysuckle and dogwood fruits are usually eaten or rotted by late November while roses, crabapples and viburnums offer wintering birds like cedar waxwings and robins sustenance into early spring.

Birds, Butterflies, Plants, Insects

They're all connected. While birds are feasting on plants, they're pollinating them, dispersing their seeds and eating insects that might otherwise damage the plants. Meanwhile trees are feeding caterpillars that may end up feeding the birds. The trees below are listed in order by the impressive numbers of butterfly and moth caterpillars they host:

- Oak, *Quercus*—532
- Willow, *Salix*—455
- Poplar, *Populus*—367
- Maple, *Acer*—297
- Hickory, *Carya*—235



Guide to the Sources for Birds



Fall & Winter

Some of the best late winter food sources for birds are actually unpalatable earlier in the season, needing to freeze and thaw several times before birds will eat them.

Insects are essential to birds in both spring and winter, so yard litter from the previous year also offers important food options.

- ☛ Chokeberry, *Aronia*
- ☛ Conifers, *Abies*, *Picea*, *Pinus*, *Prunus virginiana*—crossbill, cedar waxwing, swallow, bluebird, catbird
- ☛ Crabapple, *Malus*—preferably smaller-fruited types that retain fruits into winter
- ☛ Dogwood, *Cornus*—migrating songbirds, robin, bluebird, thrush, flicker, catbird, vireo, kingbird, junco, cardinal, warbler, wild turkey, grouse
- ☛ Hackberry, *Celtis*—cardinal, northern flicker, northern mockingbird
- ☛ Hawthorn, *Crataegus*—cedar waxwing, sparrow, ruffed grouse
- ☛ Mountain ash, *Sorbus*—cedar waxwing, brown thrasher, eastern bluebird, gray catbird, grosbeak
- ☛ Oak, *Quercus*—northern flicker, red-headed woodpecker, bluejay, wood duck (dwarf chinkapin oak produces an abundance of small acorns on a 15' tree)
- ☛ Persimmon, *Diospyros virginiana*—bobwhite, eastern bluebird
- ☛ Sumac, *Rhus*—30+ species eat these persistent fruits
- ☛ *Viburnum*—especially cranberrybush, blackhaw and native nannyberry. Catbird, robin, eastern bluebird, cedar waxwing
- ☛ Vines—*Celastrus*, *Vitis*, *Parthenocissus*, bittersweet, grape, Virginia creeper
- ☛ Winterberry, *Ilex verticillata*—robin, bluebird, cedar waxwing



**Nannyberry viburnum,
*Viburnum lentago***

Give Me Shelter

- ☛ Conifers offer valuable shelter during harsh winter months when deciduous trees have lost their foliage.
- ☛ Most birds roost just 4-6 feet from the ground, so having different layers of groundcovers, grasses, taller perennials, shrubs, vines and trees offers important protection from the elements and from predators.
- ☛ The denser, more camouflaged and more prickly the habitat, the better protection it offers from predators on the ground or overhead.
- ☛ Leaving twigs, branches, leaves, grass clippings and even dead trees in the landscape offers cavities for nesting, insects for food and nest-building supplies.
- ☛ Safety is as important as food. Birds may choose less-favored foods in sheltered conditions over more desirable foods with less protection.
- ☛ Sheltered areas that face south offer the additional advantage of winter sun.



**Dwarf chinkapin oak,
*Quercus prinoides***



**Berries of native roughleaf dogwood,
*Cornus drummondii***

“Do I have to choose? Mourning doves because when I was little they were the alarm clock when I stayed at my grandparents’ house, and because they still nest in my big trees. Goldfinches for the pure beauty of the flash and flutter. Chickadees because they are such perky little things, and so fun to watch as they pluck one seed and carry it to a branch. Cardinals because they are loyal



to one another for life, the gentleness with which he feeds her seeds, the beautiful call that heralds spring, red against white in the winter, teaching the young ones to feed (I have had as many as six pairs in my yard at once). Nuthatches because of their soft ‘meep meep’ sound, upside down tree trunk travels, and careful tucking of seeds into the bark of the tree even as they search for insects.”
Kim Todd, Extension Landscape Specialist

“Two of my favorites are the brown thrasher, because of its crazy diverse song, and cedar waxwings which are elegantly beautiful and colorful without being gaudy.”
Kendall Weyers, Nebraska Forest Service

“One favorite of mine is the turkey vulture, certainly not for appearance but because of its unique and impressive adaptations. They can soar up to six



hours without a single wing beat, have an acute sense of smell and are comfortable roosting near human activity. Other favorites are birds from the tropics, like the bobolink, which weighs less than an

Some of Our Favorite Birds

ounce and travels nearly 5,000 miles to come here and raise its young. There’s the annual splendor of the sandhill crane migration and just as captivating are the more than 36 species of shore birds that pass through almost unnoticed. From the American white pelican, a true dinosaur with the second largest wingspan of any North American bird, to the semi-pileated sandpiper on its way to nest in the subarctic, the pageantry of avians seems endless. Many resident birds have characteristics and habits that are just as enjoyable to watch in your backyard. Blue jays are a prime example, these monogamous birds follow a strict hierarchy in coming to feeders. If time allows, they will test each peanut, picking them up and then dropping them to test for weight and get the best one. So really, of the 914 bird species of North America, how DO you choose your favorite bird?”
Dave Titterington, Wild Bird Habitat

“Blue jays remind me of Steller’s jays in Colorado. They’re loud, noisy birds with an attitude. They seem like intelligent and inquisitive birds that are interested in any landscape changes. I like to lay in the hammock and use the Merlin Bird ID app to call in jays. Young ones in particular are very curious and will come quite close to try to find the other bird. It’s also fun to watch them stash acorns. I read somewhere that blue jays fitted with tracking devices were found to cache 3,000-5,000 acorns in a fall season. That is a lot of potential tree plantings!”
Eric Berg, Nebraska Forest Service

“I’m most fond of the white-breasted nuthatch along with the brown creeper. Clinging to the trunk, the nuthatch, with his beak pointed down, works his way down the tree while the brown creeper works his way up. I often wonder what they say to each other as they pass.”
Justin Evertson, Nebraska Statewide Arboretum

“I’m drawn to goldfinches, orioles, bluebirds and cardinals for how colorful they are. And I enjoy meadowlarks and red-winged blackbirds for their songs.”
Aaron Clare, Nebraska Forest Service
“I’ve always been partial to red-winged blackbirds. They are a great sign of spring-to-come for me. Once I saw a huge flock, thousands and thousands of birds, moving through the wetland area just south of Ceresco. They filled the trees



along a country road east of Highway 77 and spread into the fields. I had to go investigate and sure enough, they were red-winged blackbirds. It was really cool to be surrounded by them!”
Sarah Browning, Extension Educator

“Most of my favorites are by song; orioles, because how can such a brightly feathered bird be SO hard to find; thrashers, because they find the absolute highest point they can, from which to broadcast their amazingly accurate mimicry; blue jays, for their spot-on red tail hawk imitation; robins, although they need to sleep later in the summertime; and catbirds, also a talented mimic, and especially good at cat calls! Oh, and the yellow-shafted flicker, because their call reminds me so much of the mountains.”
Carol Morgenson, Horticulturist, Backyard Farmer Gardens

“The rose-breasted grosbeak is a favorite summer resident. The male is spectacular with the black and white flashes as he flies and the gorgeous rose-colored V on his chest. The female looks like a large sparrow but with a large beak. My favorite year-round residents include cardinals, so beautiful against a winter snow, and the white-breasted nuthatch which practically takes birdseed out of my hand. They provide daily pleasure for anyone taking the time to enjoy their presence.”
Dan Wheeler, bird enthusiast

Favorite Birds continued

“Favorite bird in my yard—so many choices. The dapper cedar waxwing? The aerobatic barn swallow? The scarlet flash of the cardinal, or orange flash of the Baltimore oriole? In the sky overhead sandhill cranes like strings of pearls against the blue sky? The woodpecker family—yellow-shafted flicker, red-bellied, hairy, downy and red-headed—with their swooping flight and distinctive calls? The incredible maneuverability of the ruby-throated hummingbird? The winsome bluebird, the cheerful gold finch, the energetic chickadee? The list is long. All 60+ species I have recorded on (or above) our acreage are my favorites.”
Ron Yoder, Associate Vice Chancellor,
Institute of Agriculture and Natural Resources

“Currently my favorite bird here in western Nebraska is the blue grosbeak. I am in love with this bird! I also LOVE my Merlin Bird ID app from Cornell; I use it all the time.”
Amy Seiler, Nebraska Forest Service

“I love the house wren, their song takes me back to my grandparents’ backyard in West Point.



They had a couple wren houses and they were always scolding us, bouncing around with their stubby tails held up in the air. I also have a great affection for the black-capped chickadee, I love their pretty song with the high-pitched whistle and the little buzz-buzz whistle they use to defend their territory. I like to watch them as they move about among the low branches of trees, working their way down to grab a sunflower seed from a feeder or to catch a quick drink. They eat, drink and exit in a hurry. How can such a cute little bird survive our brutal Nebraska winters?”
Bob Henrickson, Nebraska Statewide Arboretum

“At our home in Lincoln I’ve come to really love the presence of Carolina wrens. These southerners have become increasingly common in Nebraska and now even stay through the winter. They have a beautiful rusty color and a portly little body that bobs up and down when they sing. And they sing loudly and with gusto. They just seem to exude joy.

I’ve also recently become more aware of warblers—small, beautiful birds that pass through oak woodlands and neighborhood parks in Nebraska, mostly during their spring migration from Central and South America to their breeding grounds in the northern U.S. and Canada. Warblers and other migrating



songbirds rely on healthy oak woodlands as they make their way north and south each year.

One result of the bird, butterfly and bee surveys we’ve done at Lauritzen Gardens is the planting of more bur oaks; so far we’ve planted more than 300 raised from seed collected on our own native stand. We’ve started watching for them each spring and have been surprised to observe 23 different species so far! They’re like hidden gems we didn’t know we had.”

Jim Locklear, Lauritzen Gardens

“If the metrics are tenacity and innovation, my vote goes to brown thrashers. A few years ago a nesting pair spotted my indoor cats through the window and began scolding the cats morning, noon and night with their ‘tsk, tsk, tsk’—sometimes with one at the front window and the other at the back. I haven’t seen them for several years now, probably because the brush and leaves they used for nesting and foraging have been cleaned up and there are some large outdoor cats around.

Great blue herons are such elegant birds, that is until they try to land on a nest. They build huge sloppy-looking nests in a rookery, sometimes with 50 or more pairs nesting together and creating quite a ruckus—such a contrast to their usual quiet elegance. In Nebraska, rookeries can be found along the Platte River. Like so many of our birds, they need both healthy plant communities AND healthy water.”

Christina Hoyt, Nebraska Statewide Arboretum

NOTE: Most photos on these pages courtesy of Audubon.org

Cover article continued

was that sounded like water trickling off a fountain until I realized it was coming from cowbirds. And if I seek a fond memory of the family farm, I think of the lovely song of the western meadowlark. When I close my eyes I can almost smell my grandma’s bread baking as a meadowlark sings from the top of a nearby fence post. In my mind, it’s always a beautiful spring day without a care in the world.



For a tree and landscape enthusiast, it’s a natural thing to also start liking birds. Whether intentional or not, when we plant trees, shrubs and other plants, especially native species, we end up creating great bird habitat. Throw in a few feeders and a source of water and we can be easily entertained by a wide variety of birds throughout the year. Thankfully we even have some tough birds that stay through the winter. I don’t know how they survive those coldest of January days, but the juncos and cardinals sure help me get through that drab and foreboding time of year.

Unfortunately, research is revealing a stark decline in many bird species across North America. This is especially true for both grassland and forest-edge species that show up in Nebraska (Audubon 2016 report). Humans are the primary cause of rapid wildlife decline across the globe including that of birds.

The good news is that we can all help make a positive difference. Anyone who owns or manages property can plant a mix of trees, shrubs and prairie plants that are not only beautiful, but which also provide food and shelter to birds and other wildlife. Farmers and acreage owners have a special opportunity to create habitat, but even the average homeowner can do their part. And we can all join with Audubon and/or other environmental groups working to preserve habitat.

And by all means, if you see kids with BB guns, remind them not to shoot birds—or each other for that matter. We hope you enjoy this issue of **The Seed** which takes a closer look at our feathered friends and the many benefits they provide.

Get Them Interested—Birding with Kids

Whether it's your own children, students, grandchildren, friends or neighbors, here's a few tips to get kids interested in birds.



Take them to (or create) places with the food and shelter birds need:

- Edges of fields or forested areas where habitat changes from one type to another.
- Sheltered areas with trees and shrubs that offer safe nesting at different levels and density.
- Areas with dead trees, broken branches and twigs with nesting materials and burrowed insects.
- Accessible water.

Let them be mystery-solving detectives figuring out what bird it is by looking for characteristics like:

- Color and placement of colors—wings, breast, tail.
- Size—is it the size of a tiny hummingbird, small chickadee, medium robin, large hawk or “huge” like an eagle or heron.

- Shape—slender or fat, length of legs and tail, crest on the head.
- Behavior—movement on the ground and in the air, how they perch or climb on trees.
- Song—does it sound like particular words or melodies?

Resources and recommendations:

- Low magnification binoculars are easier for kids to use. Encourage them to locate the bird first with their bare eyes and then use the binoculars.
- Journals or sketchbooks can help them record and illustrate their finds.
- Find bird guides for their level.
- Take cameras to help them identify birds later on.
- Be quiet and careful and wear neutral clothes.
- Don't disturb nests, nesting birds or baby birds.
- Don't go onto private property or leave litter, and try to stay on paths.
- Start beginners out with common birds they're familiar with.



Sandhills cranes,
photographybykeller.com

Birds by the Number

“Every year 400,000 to 600,000 sandhill cranes—80 percent of all the cranes on the planet—congregate along an 80-mile stretch of the central Platte River in Nebraska, to fatten up on waste grain in the empty cornfields in preparation for the journey to their Arctic and subarctic nesting grounds.” Smithsonian.com (Above: Photography by Keller)

“How many caterpillars does it take to raise a nest of chickadee chicks? Native oak trees are host to more than 550 species of moth and butterfly caterpillars. The ginkgo, a common ornamental landscaping tree from Asia, supports only five species.” Audubon.org

“A cedar waxwing eating dogwood fruits needs 230 berries a day. While we humans can't eat dogwood berries, we do love blueberries. So by comparison, if we ate the same amount of blueberries relative to our weight of, say, 140 pounds, we would have to eat 46,577 berries—a whopping 215 pints—per day!” Evansville Courier & Press

“Scientists have determined that the world's birds eat 450 to 550 million tons of insects each year. That's as many as 20 quadrillion individual bugs.” USA Today

“Greater prairie chickens were once abundant in the Great Plains but their numbers have dropped rapidly as grassland habitat has been converted to other uses. Aside from habitat loss, the greater prairie chicken is also threatened by loss of genetic variance resulting from the isolation of populations with no natural corridors between groups.... The largest remaining populations are in Kansas, Nebraska and South Dakota.” The Nature Conservancy

Creating Bird-friendly Habitat

Edited from the National Wildlife Federation, www.nwf.org/Educational-Resources/Wildlife-Guide/Birds

- ☛ Provide water year-round.
- ☛ Plant natives that offer foods in all seasons—nectar, seeds, berries, nuts.
- ☛ Remove invasive plants that might out-compete natives.
- ☛ Don't use insecticides since insects are a primary food source.
- ☛ If possible, leave dead trees, branches or piles of twigs for cavity-dwelling birds and as a source of insects.
- ☛ Set out birdfeeders for supplemental food.
- ☛ Keep cats indoors (particularly important for fledgling birds).
- ☛ Reduce lawn areas, which have little to offer and often involve mowing, fertilizing, watering and insecticides.
- ☛ Learn to identify the birds common to your region.



Birds and Birding Resources

For Nebraska

- Birds of Nebraska Online—birds.outdoornebraska.gov. Data on 500+ birds of Nebraska with GIS maps of territories.
- Nebraska Birding Trails—nebraskabirdingtrails.com. Lists 400+ birding sites with checklists for specific regions. Used together, these first two sites can help plan a trip to observe particular species.
- Nebraska Bird Library—www.nebraskabirdlibrary.org. Search by size, color, range and habitat; or by common or scientific name or bird group.
- Nebraska native plants—plantnebraska.org/plants. Lists of native plants.
- Project BEAK—projectbeak.org. Interactive, web-based curriculum for grades 5-8 that covers conservation, bird adaptations, diversity and threatened/endangered birds; plus video clips, interactive games, quizzes and lesson plans.
- Wild Bird Habitat Store—wildbirdhabitatstore.com. Great regional resources for birding enthusiasts since 1993.

Cornell Lab of Ornithology

- All about Birds—allaboutbirds.org. Bird ID, life history, sounds and videos; the most comprehensive guide to North American birds.
- Merlin Bird ID—merlin.allaboutbirds.org. Answer 5 simple questions for quick ID.
- Merlin Bird Photo ID—merlin.allaboutbirds.org/photo-id. Submit a photo to get a list of possible species.

More Online Resources

- Audubon Guide to North American Birds—audubon.org/app. Free complete field guide to 800+ species of North American birds with photos, audio clips, multi-season range maps and in-depth text by bird expert Ken Kaufman.
- Audubon's Native Plant Database—audubon.org/native-plants. Enter zip code to explore the best native plants for birds in your area, local resources and links.
- EBird—ebird.org/home. Keeps track of bird lists, photos and sounds from specific regions; the world's largest birding community, it contributes to science and conservation.
- PlantSnap—plantsnap.com. Submit photo for ID of plants, flowers, trees, cacti and mushrooms; contains 90% of all known species of plants and trees.
- Sibley's Songbird Sleuth—songsleuth.com. Submit bird songs for ID.

These links can be accessed online at plantnebraska.org/plants/publications



Blue heron, photographybykeller.com

**"If you take care of birds, you take care of most of the environmental problems in the world."
Dr. Thomas Lovejoy**

Nebraska Statewide Arboretum
102 Keim Hall
P.O. Box 830964
Lincoln, NE 68583-0964

Non Profit
U.S. Postage
PAID
UNL

Landscape Ideas, The Recycled Garden, Kids Outdoors and more at [pinterest.com/nearboretum](https://www.pinterest.com/nearboretum)



Lots of Ways to Connect!

- JOIN US for events, including talks, tours, plant sales and free First Thursday noon brownbags at the Jayne Snyder Trail Center, 228 N 21st in Lincoln
- BUY NATIVE and recommended plants from us, many with local seed source
- RECOMMEND our organization and resources to friends, family and co-workers
- GIVE. We are a grassroots nonprofit that relies on our members
- FOLLOW us on Facebook, Twitter, Pinterest or Instagram

 www.facebook.com/NeArb

 twitter.com/NEarboretum

 pinterest.com/nearboretum

 instagram.com/nebraskastatewidearboretum

plantnebraska.org

This publication produced by



Thanks to our partners

