

A REFUGE IN THE CITY

backyard wildlife guide



downy woodpecker

Bringing wildlife to your back door

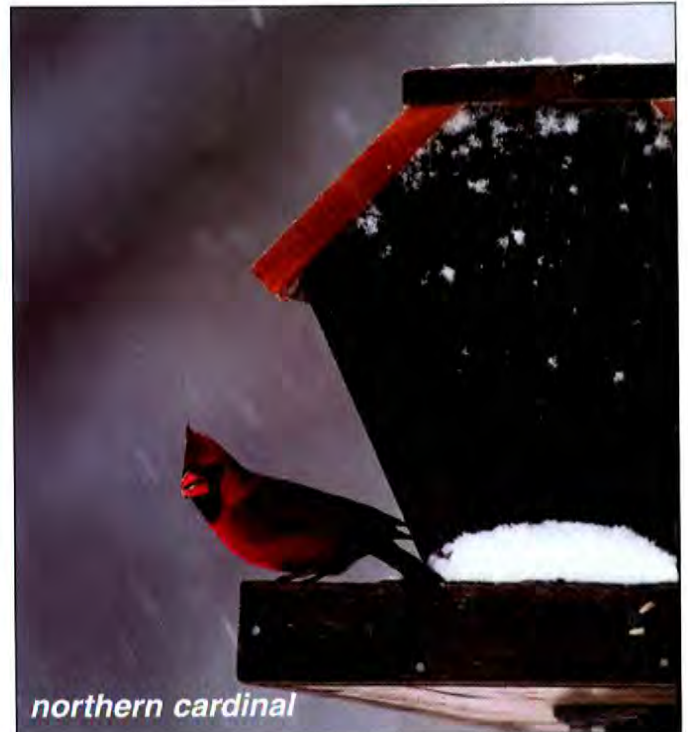
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Support wildlife through the Chickadee Checkoff Program on your state income tax form.

Check for the Chickadee!



northern cardinal

Contrary to popular belief, Kansas is an urban state. According to the latest census, three-quarters of the state's population lives in cities of 50,000 or more. The concept of Kansans as rural people, closely tied to the land, is becoming outdated. But this doesn't mean Kansans have abandoned their inherent love of wildlife.

Both city dwellers and small town folks love watching the antics and activities of squirrels, house finches, cardinals, rabbits, and a variety of other wildlife – right in their own backyard. Many of these urban wildlife watchers participate in the Department of Wildlife and Parks' annual Winter Bird Feeder Survey, sponsored

by the Chickadee Checkoff.

Still others participate in the agency's Backyard Wildlife Habitat Improvement Program, ensuring their viewing opportunities year-round. Through this program, participants are recognized for developing many of the backyard wildlife habitat concepts discussed on the following pages. You can participate by contacting the department's Division of Fisheries and Wildlife at the Pratt office. By filling out an application and sending \$5, Chickadee Checkoff will give you a handsome certificate and a sign to hang on the back porch recognizing your commitment to improving wildlife viewing opportunities in your neighborhood.

Urban wildlife habitat development is growing. As people become more isolated from nature, their thirst for "wild" experiences grows. It's not uncommon to see patches of bluestem grass, fragrant sumac hedges, or cedar rows in the middle of suburbia. Buffalo grass may one day be as popular as fescue. For those who would rather see robins and rabbits out their back window than a perfectly groomed – and unoccupied – mat of green, the choice is simple.

If you're interested in bringing wild Kansas to your backyard, read on. There's a world you may never have imagined out there, right in your own backyard. Right in the middle of the city.

Plant a Home



The most dependable way for anyone to take care of backyard wildlife is to create a natural system that enables critters to take care of themselves. Feed a bird in your backyard, and you might help keep it alive. Plant wildlife habitat, and you'll give it a home. Seed- and fruit-bearing shrubs, vines, annuals, and trees not only feed birds, they help produce dozens more, providing places to nest, feed, roost, and escape predators. In return, birds will clean insects from your lawn, trees, and garden and entertain you with their antics, color, and song.

Beyond your initial landscaping, about all you'll have to do is sit back and enjoy the show, year after year. As an additional bonus, all those trees and bushes will increase the value of your property.

Variety, density, and edge are the most important elements of backyard habitat development. Simply put, a greater variety of plants attracts a greater variety of animals. Tall, mature trees attract Baltimore orioles, eastern and western kingbirds, scarlet tanagers, red-eyed vireos, squirrels,

screech owls, and other tree-dwelling animals. Shrubs and shorter trees provide nesting sites for robins, cardinals, chickadees, grosbeaks, and many more colorful songbirds. Bushes and vines appeal to house wrens, song sparrows, towhees, catbirds, and yellow warblers. Rock walls or rubble piles house chipmunks, lizards, and rodent-eating snakes. Tall grasses serve as nurseries for cottontails and shelter for quail.

Plant variety creates another important element of wildlife habitat – food variety. A good mix of vegetation provides insects for all kinds of birds, and a flower garden can entice butterflies



and hummingbirds. Squirrels, bluejays, and other nut eaters relish mast-producing trees such as oaks, hickories, walnuts, and pecans. Summer birds can't resist cherries, blackberries, and mulberries. Drought-resistant shrubs such as fragrant sumac, cotoneaster, and pyracantha attract a variety of wildlife in fall and winter.

The density of your plantings is just as important as variety. Dense cover is essential when winter winds howl across your yard. When deciduous trees and shrubs have lost their leaves and provide little cover, evergreens provide a cozy refuge. A thicket of juniper, or cedar makes a snug roost for everything from northern cardinals to rabbits and even white-tailed deer, if you're close to the edge of town. In fact, cedars may be the perfect wildlife trees for Kansas. Dozens of bird species nest in them – dozens more hide in them – and the nutritious blue berries provide much needed winter nourishment. A cluster of cedars in a corner of the yard is a good investment in wildlife.

Placement of plants is a factor that must also be carefully planned. For the best view of your wildlife habitat – and the wildlife in it – arrange specimens with the tallest in the back, descending to the shortest closest to the house.

Biologists know that wildlife are found in greatest numbers and greatest variety in areas between habitat types. These areas are commonly called "edge." To create the maximum amount of "edge" in your yard, mix and space your plantings. If you have clumps or islands of dense shrubbery surrounded by grass, brush-loving species such as brown thrashers will venture into the open to sunbathe or dustbathe. Open-ground species such as robins will dart into the nearby thickets for protection. You can also create edge by alternating strips of



Plant ...

bushes with strips of native grass. Plant flowers along the inside edge of your bushes nearest the house to attract butterflies and hummingbirds. Plant a section of grain - such as milo or sunflowers - and leave it standing for winter snacks.

If your yard already has a few mature trees, design additional plantings around them. Shrubs grow quickly and provide excellent summer habitat. Don't trim the lower branches because nesting birds, mammals, and reptiles need them for protection. If your older trees die or have large dead or damaged branches, don't automatically remove them. A dead tree is worth as much to wildlife as a live one. If they don't threaten to fall on your garage or head, allow them to weather naturally, providing nesting cavities for chickadees, woodpeckers, and raccoons. If it becomes necessary to remove a dead tree, consider leaving a stump. Anything from one to 20 feet tall will provide food and housing for a surprising number of animals, especially birds.

Expensive, manicured lawns don't provide much wildlife cover, but native grasses can supply food, cover, and nest sites for cottontail rabbits, toads, lizards, and a variety of insects that birds eat. A stand of little bluestem, big bluestem, Indiangrass or switchgrass makes a colorful landscape border or centerpiece. For areas where short-grass is desired, buffalo grass and blue gramma are natural choices and, once established, require far less maintenance and water than bluegrass or fescue.

Variety, density, edge - the keys to successful wildlife plantings. On the following pages, you will find illustrations, tips, and charts to help you make the right decisions for your backyard wilderness. Happy planting.



cottontail rabbit

domestics



- alfalfa
- barley
- sweetclovers
- domestic sunflowers
- corn
- milo
- Prosomillet
- salvia
- daisies

forbs and native grasses

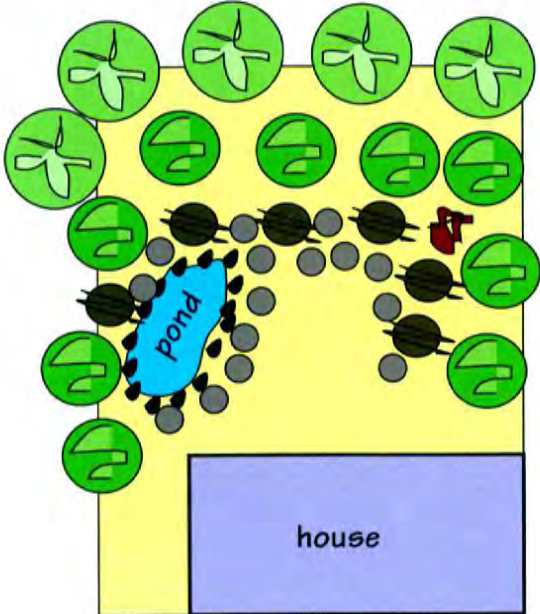


- Indian grass
- big bluestem
- little bluestem
- switchgrass
- buffalo grass
- milkweeds
- all wild sunflowers
- purple coneflower
- wild indigo
- compassplant
- goldenrod
- larkspur
- penstemons
- gayfeather
- Illinois Bundleflower






vines



- bittersweet
- Virginia creeper
- wild grape
- trumpet vine



Legend

-  large trees
-  medium trees
-  bushes
-  grasses and flowers
-  brush pile

Plant large trees to the outside, medium trees, shrubs, forbs, and grasses to the inside.

- highbush cranberry
- gooseberry
- golden currant
- cotoneaster
- holly
- firethorn
- wahoo
- sumac
- wild rose
- hazelnut
- dogwoods
- honeysuckle
- autumn olive
- elderberry
- sand plum
- blackberry
- raspberry

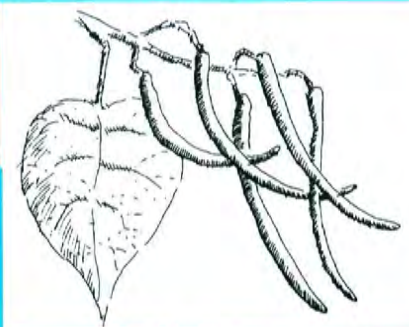
shrubs



- white oak
- burr oak
- northern red oak
- pin oak
- hackberry
- ash
- black walnut
- pecan
- butternut
- hickories
- suger maple
- silver maple
- honey locust
- basswood
- sycamore
- cottonwood

large trees

- mulberry
- crab apple
- catalpa
- red haw
- hawthorn
- osage orange
- black cherry
- choke cherry
- pawpaw
- persimmon
- redbud
- redcedar
- Scotch pine
- Norway pine



medium trees



Feeding through the winter

Wild birds and other animals need food, water, refuge from weather and predators, and a place to breed. This is no simple requirement, especially when you try to provide all these elements to a changing array of wildlife through four seasons. Variety is the key to meeting these changing and complex needs. Variety in species - many different kinds of plants offer a continuous, dependable food supply that is not likely to be devastated by disease. Variety in height - many bird species parcel out habitat among themselves according to the height each prefers; the more levels you offer, the more species you're likely to see. Variety in layout - even in fairly small areas, the

amount of edge between major kinds of vegetation is important. Islands and irregular sections of woody vegetation mixed with grass and forbs create more edge and are more attractive to wildlife than simple blocks.

Most people know that the easiest way to attract wildlife is to feed them. Birds are the most popular wildlife to feed, and they're the quickest to respond to your efforts simply because they are both numerous and mobile. A few seeds and a little suet is all you need to start, and if you live near good habitat such as woods or brushy fields, you could lure a few birds the first day.

The numbers and kinds of mammals you attract also depends on the proximity of good habitat. If you own

mature trees, you might soon find a squirrel rummaging through your bird feeder. Cottontails will set up house-keeping in weeds, bushes or even a heap of debris. Near dusk, they'll hop over to sample the table scraps spilled by the birds. If your property abuts a woodlot or other extensive natural area, you can expect nighttime visits from hungry raccoons, opossums, skunks, and even deer.

What you feed and how you feed it are also important. For example, birds that feed on the ground - such as towhees, mourning doves and juncos - won't be attracted to sunflower seeds hung from a feeder in a tree. They'd rather scratch and pick through seed scattered on a bare spot in your lawn.



pine siskin



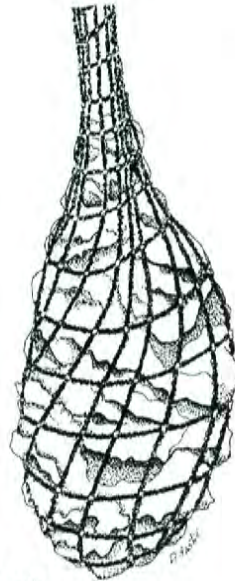
red-bellied woodpecker



Feeding ...

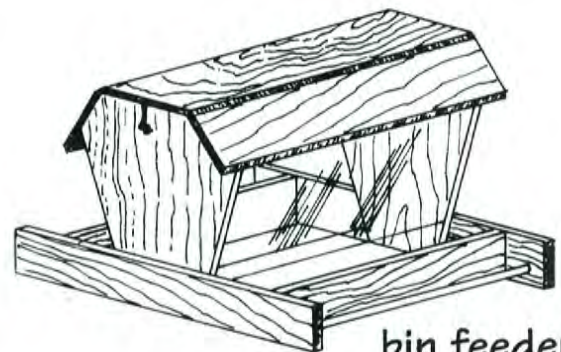


milk carton feeder



suet feeder

peanut butter/suet log



bin feeder

Once they begin foraging regularly, you can build a platform with raised edges to hold the seed a few inches off the ground. This will help keep seed out of the mud. A roof over the structure will further protect the feed.

Swinging feeders are fine for the more hyperactive of tree-feeding birds, but most prefer a stable feeding station. An automatic hopper feeder, that stores a gallon or more of feed and dispenses it as needed, will become the focal point of feeding activity throughout the winter. It should be mounted on a sturdy post or tree branch. Heavy metal "T-posts" used for fencing are easy to drive in the ground and can be placed wherever viewing opportunities will be greatest. The feeder will be most effective when placed within a



fox squirrel

few feet of shrubs, especially evergreens, but not so close that cats and other predators can lie in ambush.

Depending on your point of view and your pocketbook, squirrels can be joy or frustration. They will certainly help themselves to any bird feeder they can reach. If they disrupt your feeding operation, place a squirrel guard over the post just a few inches below the feeder.

Commercial guards are available, but a garbage can lid or other metal disc balanced on a metal stop or clamp should do the trick.

If you really enjoy watching squirrels but just want to keep them away from your bird feeder, skewer an ear of corn to a nail driven in a tree or post.

When it comes to seed, it's hard to

birdfeeder menu (who likes what)

SUET - northern flicker, downy woodpecker, hairy woodpecker, red-bellied woodpecker, blue jay, white-breasted nuthatch, tufted titmouse, black-capped chickadee, tree sparrow.

SUNFLOWER SEEDS - white-crowned sparrow, song sparrow, tree sparrow, Harris' sparrow, northern cardinal, purple finch, house finch, dark-eyed junco, goldfinch, pine siskin, black-capped chickadee, tufted titmouse, red-breasted nuthatch, white-breasted nuthatch, blue jay, red-bellied woodpecker, hairy woodpecker, downy woodpecker.

PROSO MILLET - white-crowned sparrow, song sparrow, tree sparrow, purple finch, house finch, dark-eyed junco, goldfinch, pine siskin.

CRACKED CORN - white-crowned sparrow, song sparrow, tree sparrow, Harris' sparrow, northern cardinal, purple finch, house finch, dark-eyed junco, goldfinch, white-breasted nuthatch, bluejay, red-bellied woodpecker, northern flicker.

THISTLE - purple finch, house finch, goldfinch, pine siskin.

beat sunflowers, especially the solid-black oil-seed type. They're inexpensive, packed with protein, and relished by the more desirable songbirds. Starlings seldom take them, but house finches love them. Combined with millet, another inexpensive grain, you have a near-perfect mix. Both can be purchased at most local grain elevators in 40- or 50-pound bags.

Suet (animal fat) is an important winter food for insect-eating birds. Get beef suet from your local grocer and hang it in plastic mesh bags from tree branches. You can also press it into holes bored in a log or place it in a wooden cage. (The one drawback of suet is that it attracts starlings.)

Although not necessary, occasional raisins, apples, and other fruits will enhance your feeding operation.

In summer, many bird watchers like

to hang hummingbird feeders. Under natural conditions, hummers may take some insects, but their primary food source is the nectar of flowering plants, such as trumpet vine. This part of the diet can be supplemented with sugar water. In the past, honey was recommended, but honey can cause a variety of health risks to these tiny birds. Sugar water should be prepared in a one part sugar/four parts water solution and boiled, then allowed to cool before serving. Although reports vary, it is recommended that hummingbird feeders be taken down before cold weather sets in, usually by October, to encourage a timely migration.

Whatever your feeding setup, keep the operation clean. Periodically clear feeders and feeding areas of droppings, which can spread disease.

In recent years, conjunctivitis (MG)

has spread through house finch populations. No feasible treatment exists for this disease in the wild but regular disinfection of bird feeders with mild bleach solution is suggested for good hygiene. Temporary removal of feeder may be necessary.

Birds and other animals survived winter on the Great Plains long before man's arrival, so feeding is not absolutely necessary. True, it can help some individuals survive particularly harsh winters, but the primary benefit lies in the pleasure it gives humans. It also increases our awareness and appreciation of nature, and this attitude enhancement may benefit wildlife in the long run. Another bonus to humans is that birds will clean insects from your lawn and garden, reducing the need for chemicals.

white-breasted
nuthatch





Give them a home

For animals, the heart takes no part in choosing a home. Home choice is a matter of function, and many species have specific nesting needs. Holes and hollows in trees are essential for the survival of wood ducks, kestrels, bluebirds, flying squirrels, and dozens more species. Man can jeopardize cavity nesters by felling dead branches and trunks, the very materials needed for good hollows. Fortunately, these can be replaced with a common artificial tree cavity – the bird house.

A bird house should imitate a tree cavity as closely as possible. Heavy, rough wood provides both shelter and a rustic look. Cedar and redwood won't deteriorate like cheaper woods such as pine. If you want to protect the bird house, finish the outside only. If you use metal or plastic, place it in a shaded area to avoid overheating.

The size of the entrance hole and its distance above the floor are important in keeping predators out. For instance, starlings will reach into shallow bluebird boxes and peck the young or adults to death. Follow the dimensions given in the accompanying chart. Don't put dowel rods or other perches beneath the entrance hole. Cavity nesting birds don't need them, but pests such as house sparrows can use them as harassment platforms.

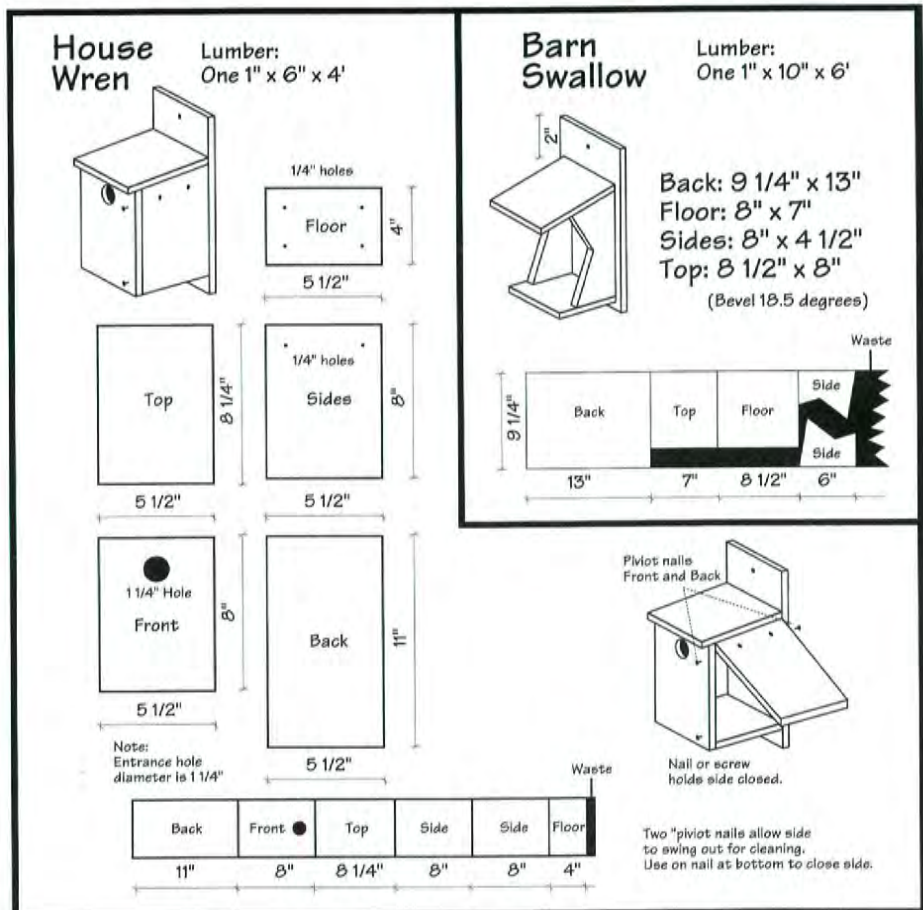
Cut the roof larger than the box and slant it forward so it sheds rain away from the hole. Hinge the roof, floor, or one side so you can clean out unwanted nests.

If predators are a problem, mount houses on posts or poles rather than in trees. Some snakes, raccoons, and house cats will rob nests if given the chance. A collar guard on the post below the house will keep most predators out.

When placing a bird house, face the hole away from prevailing wind and toward brush or branches that fledglings can fly to. Place wood duck boxes over or near water. Put barn owl boxes in large trees or high on the outer walls of buildings or silos. Shelves mounted under



eastern bluebird



building eaves may encourage barn swallows, pheobes, or robins to nest.

For woodpeckers, owls, and American kestrels, place a soft layer of sawdust in the bottom of the house.

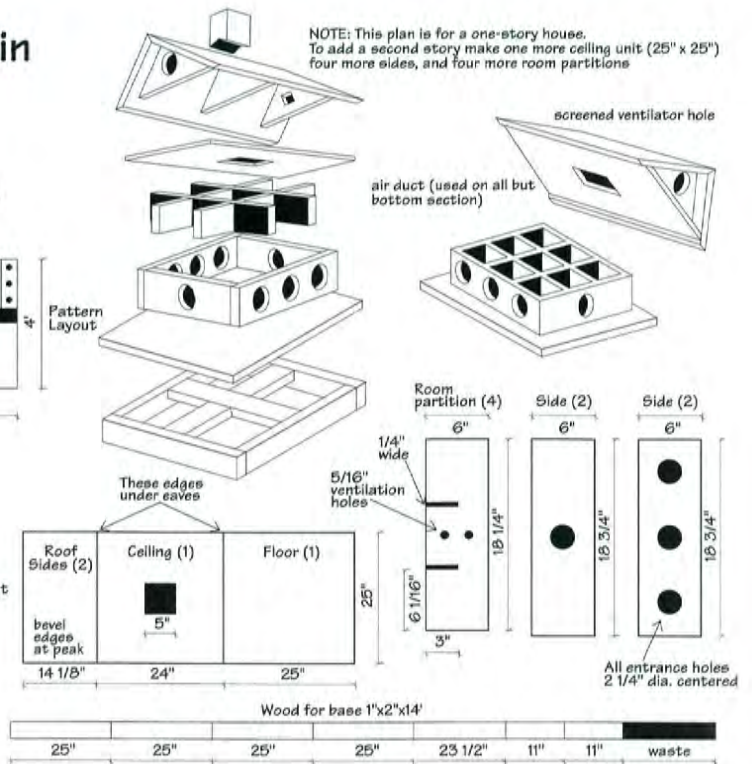
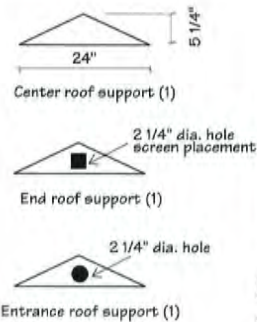
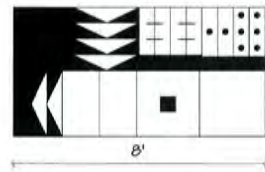
For chipmunks, just pile rocks, tile or rubble in an odd corner, being careful to leave many cavities. Tree squirrels readily accept wood duck boxes. Raccoons, if desirable, will occupy a similar box with a 4-inch hole and all other dimensions increased by 6 inches.

Toads are interesting and eat lots of insects. You can provide harbors for toads by burying plastic margarine tubs at the edges of your lawn or garden. Cut one side away and bury slightly just a few inches under ground, leaving a short runway to the surface.

Insect-eating reptiles such as garter snakes, and fence lizards will room in rock heaps, rotting stumps, brush piles, and stone fences.

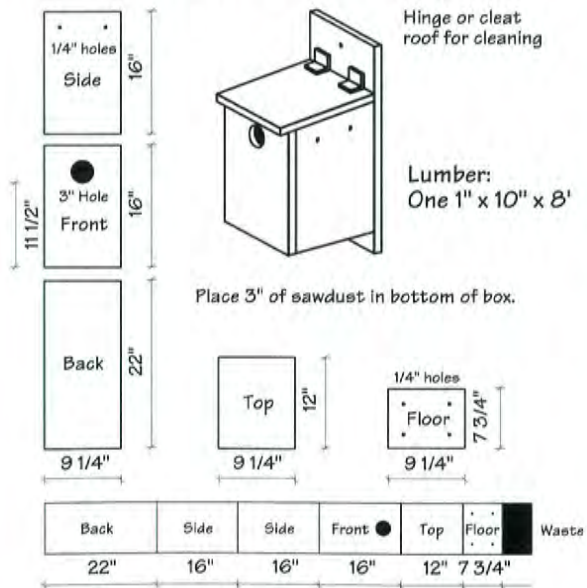
Purple Martin

- Materials**
 4' x 8' x 1/4" plywood
 2" x 2" x 6' chimney
 1" x 2" x 14' (base)
 1" x 1" x 8' (corner blocks)
 4' x 8' metal window screen
 4" x 4" x 14'



While research proves that purple martins do not eat many mosquitos, people enjoy attracting them.

American Kestrel, Northern Flicker, Eastern Screech Owl





To quench a thirst

Every type of terrestrial habitat, including your backyard refuge, is more attractive to wildlife when it has a steady water supply. Anything from an upside down garbage can lid to a multilevel series of ponds connected by recirculating waterfalls will work, and you can make it more

than just a bird bath. A backyard pool can be home to bullfrogs, fish, turtles, and even wild ducks, depending on your ambition and space.

For a safe and attractive water-hole, make it shallow, 1 inch deep or less, so small birds can stand in it and bathe. If you build a large pool, make one end of

it this shallow. Place a rock in the middle as a safe loafing area for frogs and birds. The sides should be low and gently sloping so small animals can climb out, and the pool or waterer should be in shade so it stays cool.

The sound of moving water will attract wildlife as quickly as anything.

A noisy, dripping faucet is great for attracting small birds



Commercial water sources are available at farm supply stores



Commercial bird baths



Upside-down garbage can lid

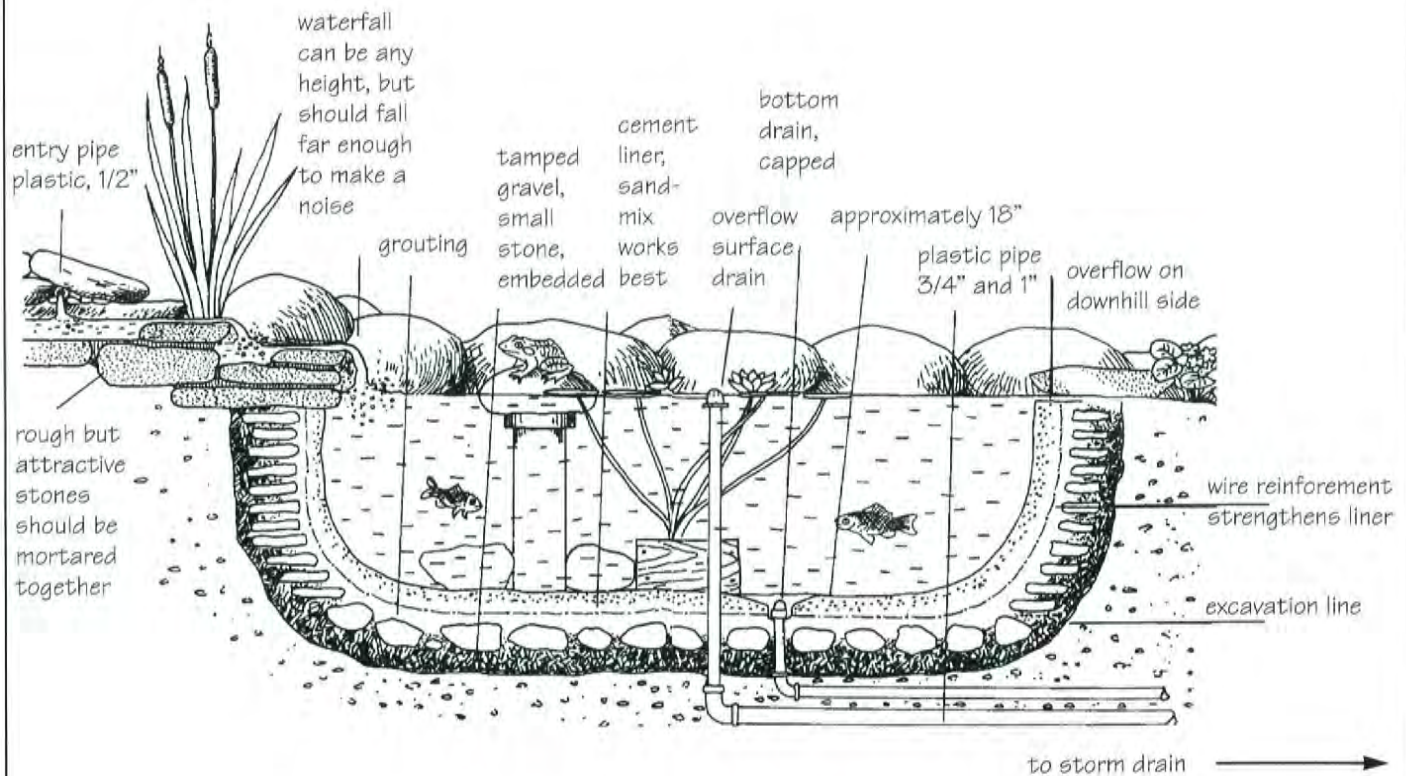
If you don't want to invest in an elaborate and expensive circulating pool, hang a leaking bucket of water over your bird bath or suspend the end of a hose over the water and let it drip. A foot-deep pool or series of pools highlighted with a few lilies, arrowhead plants, cattails, and other water plants

will complement both your landscaping and your wildlife plantings. The more vegetative cover and diversity near the pool, the more valuable it will be. Insects will live in the vegetation and provide food for frogs, salamanders, birds, and even bats.

Hardware stores and bird feeding

supply shops sell circulating pumps to keep water fresh. You'll have to import a few fish and amphibians from a nearby stream or pond, but return them before winter sets in. Keep a portion of your pool open in winter with a livestock trough warmer.

Illustration from National Wildlife Federation's book *Gardening with Wildlife*



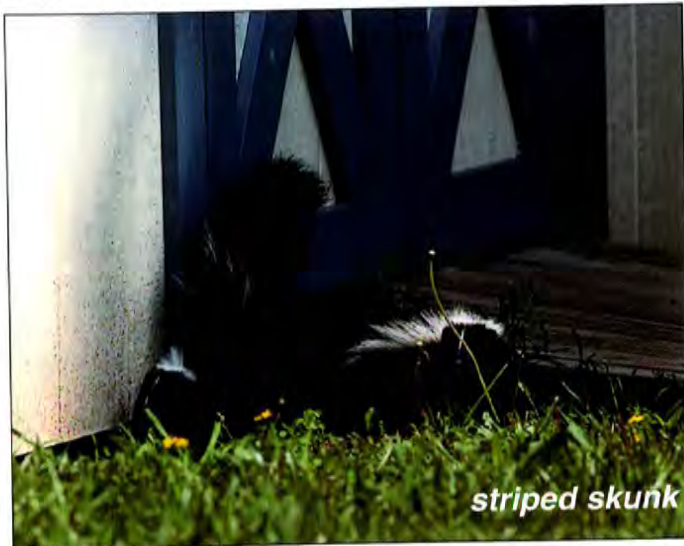


Getting along with wild neighbors

Having wildlife watching opportunities from your living room window is an indescribable pleasure, but attracting wildlife can occasionally be a mixed blessing. Everyone enjoys the northern cardinal's song and the squirrel's acrobatics, but no one likes the smell of skunk or the sound of a raccoon knocking over a garbage can in the middle of the night. Yes, it's easy to understand that skunks

and scavengers are only seeking shelter or a decent meal. Nature has a design for all creatures, but knowing this doesn't help when you're trying to get some sleep.

Here are a few tips for dealing with or avoiding critter problems. If these techniques fail, call your area Wildlife and Parks office. (Contact the Pratt operations office, (316) 672-5911, for names and numbers.) A variety of live-traps can also be purchased and used to deal with problem animals.



striped skunk

Skunks

Normally, skunks eat insects, rodents, and wild fruit, but they can do real damage to a garden. Under a porch or foundation, they can create a real "air" of tension. So how do you fight something you don't want to get near? Mothballs is one way. Slip a box into their den and scatter them around the plants you want to protect. (Never do this if small children may enter the area! Not recommended for crawl spaces or other places venting into living areas.)

Never approach a skunk or other mammal. If it is acting strangely in any way, report it to local authorities.



raccoon

Raccoons

When protected in suburban settings, raccoons quickly learn to exploit the man-made environment, making dens in garages, dog houses, and chimneys. They learn to open locks and gates, manhandle garbage cans, and steal cat food off the back steps. Sometimes they even steal the cat. If you don't want coons, don't supply them with den sites, and try to limit food supplies. If they find your garden, try leashing a dog nearby at night. A radio blaring through the night or an electric fence about six inches off the ground might also help.

House sparrows and European starlings

These two European immigrants often out-compete desirable native species for food, and starlings are notorious nest robbers. The two most practical control methods are covering crevices and cracks in eaves around buildings with wire screen and feeding only oil-seed sunflower and millet. Suet put out for other birds will attract these species, especially starlings. Starlings won't nest in boxes with shiny walls, so you might consider placing a sheet of tin or aluminum foil on one wall of your bird houses.



English house sparrow

Rabbits

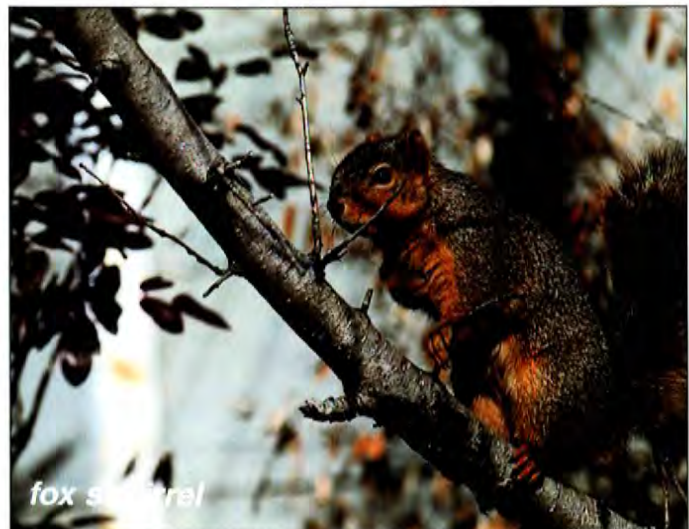
When vegetables disappear from the garden, the images of Bugs Bunny and Peter Cottontail come to mind immediately. Often, cottontails are the culprits, but sometimes they play scapegoat for ground squirrels, wood rats, crows, and even worms. Check the site of damage carefully for tracks and droppings before passing judgement. If you want a few rabbits around but not in your garden, plant lure crops such as clover and alfalfa in a far corner of your yard. Rabbits will also eat dandelions, which is an added benefit of having them around. Keep brush far from the garden. A tight, two or three-foot fence will keep them out.



cottontail rabbit

Squirrels

Squirrels can be a nuisance to some people, especially when they invade bird feeders. However, a number of squirrel guards are available to deal with this problem. Check with various bird feeding retailers and hardware stores for supplies and ideas.



fox squirrel

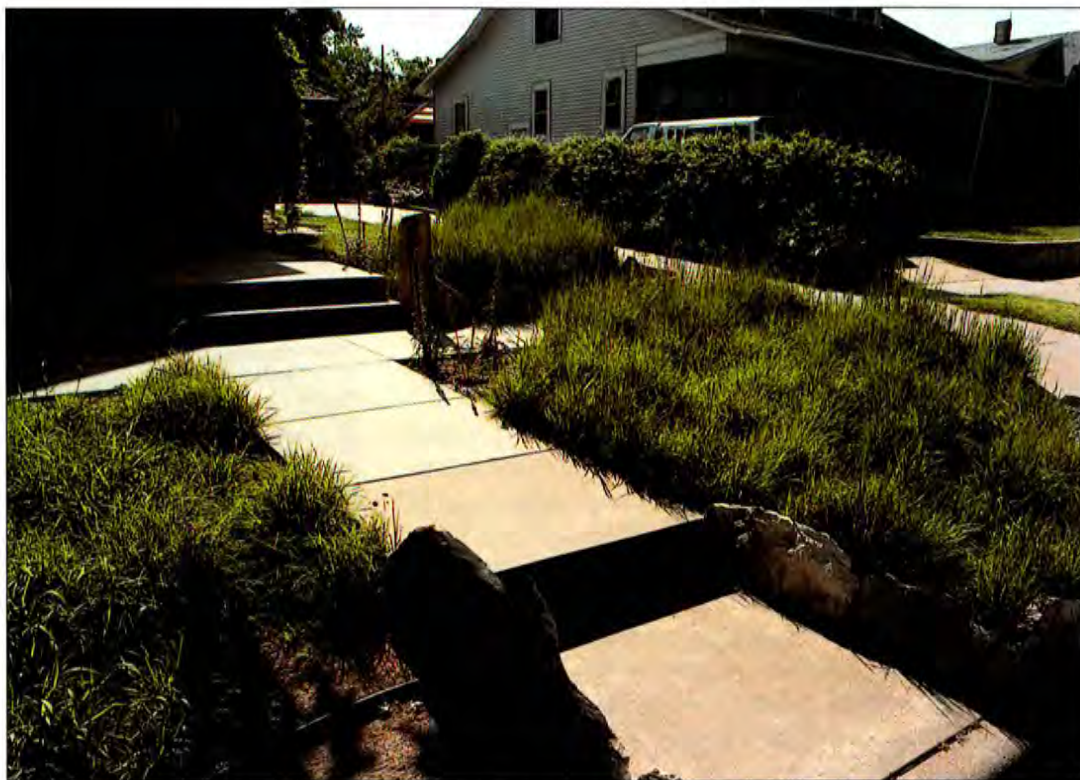
In the eye of the beholder

Suburban lots edged with oak, dogwood, and fragrant sumac and highlighted with varying heights of native grass have become more and more common in recent years. They reflect a growing awareness of the natural environment and an increasing conservation ethic, especially in regard to the use of water. They also reflect emerging aesthetic values that emphasize the natural landscape over the well-groomed lawn.

Still, a lawn landscaped for wildlife is not for everyone. Some folks may even object to their neighbor's taste in landscaping, particularly if what he perceives as "weeds" are allowed to grow. In some cases, local laws may even get into the act.

In the early '70s, a suburban Milwaukee woman planted backyard habitat only to find herself at odds with local maintenance workers and a city ordinance against "weeds." The workers mowed the woman's lawn without her permission, and she threatened to sue unless they could prove the lawn contained noxious weeds. They couldn't and had to make an out-of-court settlement with the woman.

Similar challenges have sprung up all over the country since that time. Most city governments have adopted anti-weed ordinances, forcing some amateur wildlife managers to defend their actions. These laws may simply cover noxious weeds as defined by state law, or they can go further. Brush or woody vines may be considered weeds. Native grass or other plants may be considered a fire hazard, and



some plants may be claimed to harbor rats and mice. In cities where such ordinances exist, landowners may be forced to mow some of their plantings. However, some cases have been challenged in court with the local authorities being overruled, and some states have passed laws giving homeowners broad discretion in landscaping decisions.

Until similar action is taken in Kansas, there are a few things you can do to reduce the chances of a legal challenge to your wildlife habitat efforts.

First, avoid those plants classified by state law as noxious weeds. Currently, those are leafy spurge, bur ragweed, Canada thistle, field bindweed, hoary cress, Johnson grass, kudzu, musk thistle, pignut, quackgrass and Russian knapweed (thistle). Under the law, counties have the option to include a few other species to the list, so check with your County Extension Agent

before planting. Two such plants are multiflora rose and sericea lespedeza.

For most amateur landscapers with a few patches of native flowers and a shrub or two, the question of weed control will never arise. However, those who simply want to turn their yard over to Mother Nature may have problems. Design is the key. Map your yard and research the values of the plants you want to establish. If design and organization are apparent, you will likely prevail against any challenges to your sanctuary.

Perhaps most importantly, involve your neighbors. If you think they might object, or if they do, explain what you are doing, how it benefits wildlife and conserves water, and how your neighbor will have increased wildlife viewing opportunities as a result of your efforts. Explain to them the specific benefit of individual plantings and invite them over for a winter's backyard bird watch.