## **Providing Habitat for Upland Birds**

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The prairies of Kansas are home to a wide variety of upland bird species. Whether you are a hunter, a serious birder, or simply enjoy hearing the call of a male bobwhite quail on a spring day, it is hard not to appreciate the beauty and value upland birds bring to our state. Upland birds are usually defined as those species which do not need to be close to surface water, such as rivers, ponds, or marshes, to live and reproduce. Many species can be considered upland birds, but in Kansas, local gamebirds such as the northern bobwhite quail, ring-necked pheasant, greater prairie chicken, mourning dove, and turkey are popular and widely recognized.

Kansas generally offers good hunting opportunities for upland game birds, but a variety of changes to the landscape have occurred over the years that have led to reductions in the quantity and quality of the habitat most upland bird species require. While hunters may sometimes experience "up" years, long-term trends in Kansas show decreasing overall populations of quail, pheasant, and prairie chickens. Changes in land use, farming practices and ranching methods, as well as the expansion of woodlands across the state have been the main drivers of habitat degradation and loss for these species. Although the causes of declines in some upland bird species are complex and not fully understood, one thing we can say with certainty is that, without sufficient habitat, upland bird populations will likely continue to decrease.

Not all habitat is created equal. Habitat is not a qualitative term, it simply describes a place where something lives. There can be good habitat, bad habitat, and anything in between. Better habitat produces more birds, and since most upland birds live only one to three years, sustaining their populations is best done by maximizing habitat quality and quantity so that more wild birds can naturally reproduce. Ongoing research has confirmed that releasing pen-reared birds is not an effective way to maintain or increase upland bird populations in the wild, as these individuals do not acquire the necessary survival skills from their parents to live long enough to breed.

When it comes to habitat, upland birds not only need adequate space to live and reproduce, but that space should also contain sufficient resources to meet their life needs (water, food, shelter) throughout the year. Quail especially tend to stay in relatively small ranges, so maintaining several diverse types of habitat interspersed in relatively close proximity to each other is critical. For prairie chickens and quail, optimal nesting cover is provided by healthy stands of native bunchgrasses, while pheasants commonly nest in grassy areas, crops, and fallow fields. Once chicks hatch, they will be hungry. Newly-hatched chicks cannot fly, so a parent leads them on foot to nearby areas where plenty of wildflowers and weeds grow. Once there, they feed on protein-rich insects until they grow stronger and are able to fly. As winter approaches, upland birds' diet shifts over to seeds and waste grains. Access to these seeds and grains is imperative. While we can't do anything about snow cover, we can help increase access to food by leaving harvested crop fields untilled or planted with cover crops, and by burning grasslands and woodland floors periodically to reduce the amount of litter and thatch that can make seeds difficult to find. Throughout the year, birds take shelter in nearby brushy areas, downed trees, crop residue, and tall grasses to escape hot sun, frigid winds, and predators. Having shelter readily accessible will greatly aid birds' survival, regardless of season.

When all the components of high-quality habitat are present, and in the optimum arrangement and proportions, upland birds have their best chances of survival and reproduction.

Completing projects that improve wildlife habitat is only a starting point. Stands of native grass will soon begin to show signs of thatch buildup on the ground, and woody brush, although an important part of good upland habitat, will begin to spread. Invasive plants such as Sericea lespedeza or Old World Bluestem may work their way into the area. If left unmanaged, even the best habitat will eventually turn into a forest of Eastern Red Cedars, Siberian Elms, Honey Locust, or a host of other native and non-native plant species. To keep land in the best condition for upland birds, there is no substitute for prescribed burning. Whether a piece of ground is grazed or not, periodically recurring fire will maintain grasses, soils, and woody brush in a state that closely mimics native prairie ecosystems. Chemical and mechanical control methods are important tools to use between burns, as well. Being proactive is the best approach to maintaining wildlife habitat, watching for problems and addressing them sooner rather than later. Wildlife-friendly land management is a long-term commitment, but if done correctly, the results are well worth the effort.

There are resources readily available to assist landowners who wish to improve wildlife habitat on their properties. Staff at your local USDA Natural Resources Conservation Service office can provide a full range of services, from simply answering your wildlife questions, to providing technical advice and no-obligation habitat planning, to assisting with enrollment in a variety of private and government-sponsored cost share programs. Various options can be combined to create custom-tailored wildlife habitat plans that fit individual landowners' specific goals, preferences, and property.

By providing all the necessary components of high quality upland bird habitat, we create conditions that benefit the majority of other native wildlife species as well. Humans benefit from increased wildlife habitat, too, in the form of cleaner water, healthier farm lands, and reduced soil erosion, not to mention increased opportunity for outdoor enjoyment and preservation of hunting traditions. Taking steps to enlarge and improve upland bird habitat can help protect our valuable agricultural land, enhance the sustainability of farm and cattle operations, and conserve our native wildlife resources for generations to come.