

Benefits of Snags in Your Woods

By Richard Winstead



Photo by Brian MacGowan

Woodland owners are often encouraged to remove dead or decaying trees since they have little market value, but these trees have high wildlife value. Snags are dead or partially dead standing trees. They provide cavities for nesting and resting, perches for hunting and displaying, and an abundant supply of food for insect eaters. Many of these services are also provided by live cavity or den trees.

The value of snags and cavity trees cannot be overlooked in a forest because of the role they play in the lives of many animal species. For example, a total of 89 vertebrate wildlife species in Missouri use cavity trees or snags for all or part of their life cycle. In Pennsylvania, there are over 35 species of birds and 20 species of mammals that use snags at some point in their life cycles. In addition, many species of reptiles and amphibians use the cavities in snags. Snags are also very important to invertebrate and fungi species.

In Indiana, snags are important for many species of wildlife. Screech owls and barred owls use snags and den trees for nesting and resting. Gray and fox squirrels, deer and white-footed mice, gray tree frogs, southern flying squirrels, raccoons, pileated woodpeckers, redheaded woodpeckers, and wood ducks utilize snags and den trees for foraging, nesting or shelter. Numerous songbirds including the eastern bluebird, nuthatches, chickadees, and wrens utilize snags and den trees for part other their life cycles. Osprey, kingfishers, flycatchers, and other birds use snags along the water as feeding perches.

Different species of wildlife prefer different types and sizes of snags in a variety of habitats. Some species prefer hard snags (dead or partially dead trees with fairly sound wood and some limbs remaining). Others prefer soft "punky" snags (in advanced stages of decay and rarely with limbs). Wood ducks and other large birds require large snags simply because they need large cavities in which to nest. Small species, such as the tufted titmouse, forage and nest in cavities inside smaller snags. To accommodate a variety of species, landowners should try to maintain several types and sizes of snags.

In the east, most snags do not stand for long periods of time, often falling within a decade of death. Because of this ephemeral nature, forests should be managed to maintain consistent availability of suitable snags over time. The best method to provide snags for wildlife is to retain existing snags in places where they will not create a dangerous situation for people using the nearby area for outdoor activities like hiking or cutting firewood. When the abundance or distribution of snags is inadequate or if particular types of snags are desired, snags can also be "created." Creating snags involves killing trees so that they remain standing. Success depends on the method used, the tree species you are trying to treat,

the current health of the individual tree, and the specific site characteristics such as the presence of forest pests that may accelerate the tree's death. Consider topping or girdling some large defective (cull) trees to create snags.

Management should place emphasis on larger diameter snags because they generally remain standing and retain bark longer, and support a larger variety of wildlife. As many hardwoods as possible that have natural cavities or cavities excavated by woodpeckers should be retained. Favor less-decayed snags over more-decayed snags, favor tall snags over short snags, and favor snags with greater bark cover over snags with little bark cover. Retention of leave trees and snags during timber harvesting provides habitat for wildlife that require perches, tree cavities, or bark-foraging sites as the surrounding forest regenerates. Forestry practices that eliminate these opportunities in snags and dead wood are detrimental to a diverse array of wildlife species and should be avoided.

Richard Winstead is a Supervisory Wildlife Biologist with the USDA Forest Service and is stationed at the Hoosier National Forest. benefits of Snags in Your Woods By Richard Winstead