Den Trees and Snags By Ryan Robicheau, MDIFW Lands Management Biologist

The Wildlife Division of MDIFW is responsible for management and maintenance of over 100,000 acres throughout the State. Most of this acreage is aggregated into Wildlife Management Areas (WMA) actively managed to promote, provide and enhance wildlife habitat and to provide hunting, fishing and trapping opportunities. Detailed plans developed through a multidisciplinary approach are used to reach certain goals specific to each WMA, but two general habitat features that are managed for ubiquitously on public property are den trees and snags. I'd like to take some time discussing these because they are measures that any landowner can take to enhance the habitat value of their property.

Den trees are an important for many birds, mammals and reptiles throughout the year for cover, nesting and protection from the weather. Den trees are characterized as live cull trees at least 18" in diameter with existing natural cavities created by decay, wildlife excavation (i.e. woodpeckers), or mechanical wounds. Because den trees are alive, they are more persistent than snags, which will be discussed later. In most woodlots and forestland throughout the state, den trees are not overly abundant and retention and recruitment of den trees on a property is sure to be utilized by wildlife species. Where encountered in a riparian area, all den trees should be retained if possible and a minimum of one per acre on upland areas is a balanced objective. Because den trees are live, recruitment of future den trees should be planned for as well. Certain trees with existing defects or cavities may be identified and managed to provide future needs for den trees, a factor which is especially in the intensive management practices in today's

forests. Three to five potential den trees will ensure adequate numbers in the future condition of the stand.

Another special habitat feature that is important to many species of plants, invertebrates, birds and mammals are snags. Snags are any dead or dying tree, with the optimum size at least four inches in diameter and six feet high. Larger diameter snags are generally more beneficial because they can be used by both large and small wildlife species. Larger diameter snags also take longer to decay and fall than smaller snags, which lengthens the period of usefulness for wildlife. Snags are important for wildlife because they provide a growing medium for fungi, mosses and lichens, provide shelter for invertebrates, nesting, roosting and feeding sites for birds, and mammals will use snags as denning sites, escape cover, or forage possibilities. When conducting management activities, all snags that are not safety or fire hazards should be retained. Retaining clumps of trees for snags has the added benefit of meeting safety requirements because those clumps of trees can be more easily avoided than snags that are

spaced evenly throughout the stand. Another benefit of snag retention during management activities is that after they fall, they will continue to provide valuable habitat for a variety of wildlife species, from drumming sites for grouse, to a nice safe home for mice, insects, or salamanders.

Retention and recruitment of snags and den trees are two small examples of how management of forestland with an eye on wildlife habitat can benefit many wildlife species. Theses habitat features are easily taken into account during planning and management activities and can provide a valuable habitat feature on the landscape.







