

6.6 TEMPORARY OPENINGS CREATED BY FOREST MANAGEMENT

BACKGROUND

Shrubland wildlife species are rapidly declining in New England.

Many wildlife species such as black racer and milk snakes, woodcock, brown thrasher, whip-poor-will, chestnut-sided warbler, common yellowthroat, eastern towhee, indigo bunting, New England cottontail, meadow vole, and meadow jumping mouse require grass- and shrub-dominated early successional habitat for shelter and forage throughout the year. Early successional wildlife habitats (young trees and shrubs) have become very uncommon in much of the northeast, largely due to the maturation of the forests. These habitats are ephemeral and created through some type of human or natural disturbance (e.g., forest management clearcuts, periodic hurricanes, fire, beaver activity, and insects). Coastal and valley-bottom forests, historically exposed to disturbances from windthrow and fire are far less available as habitat today due to development and fire suppression. Today's forests are often shaped by public desire to view extensive, unbroken forests in all directions, making the presence of big patches and gaps of vibrant shrubby forest regeneration created through even-aged management far less likely on the landscape.

OBJECTIVE

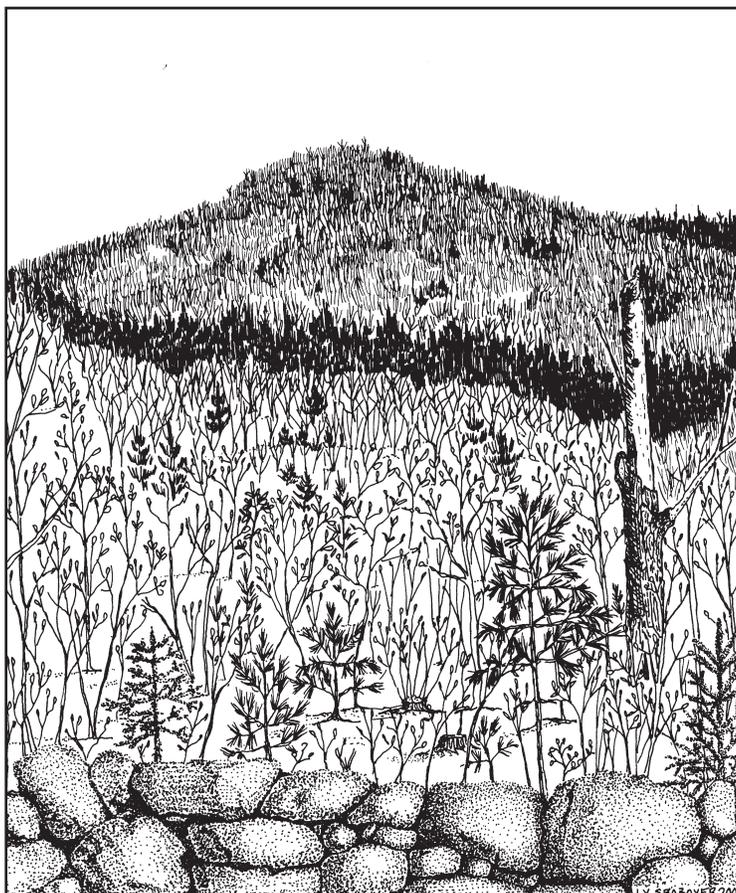
Provide a sufficient range of early successional habitat through regenerating shade-intolerant forest types.

CONSIDERATIONS

- Integrated timber and wildlife habitat management can efficiently and cost-effectively create early successional habitat.
- Larger regenerating patches attract more species of early successional wildlife than smaller regenerating patches. To attract and support early successional birds, the minimum effective patch size probably exceeds 2½ acres and spans the gap between the maximum size of group selection cuts (2 acres) and small clearcuts (10 acres).
- Shade-intolerant tree species (aspens, pin cherry, and paper birch) are best regenerated by clearcut, patch, and large group selection practices during the snow-free season.
- Use of clearcuts by early successional birds peaks around 10 years post-cut, and generally disappear from clearcuts within 20 years. A more frequent re-entry schedule than every 20 years can help maintain the occurrence of such ephemeral habitat.
- Isolated patches of early successional habitat in extensively forested landscapes are likely to have lower rates of shrubland bird occupancy than forested landscapes with higher percentages of early successional habitat.
- Statewide estimates to optimize early successional habitat for the array of early successional wildlife suggest a goal of 5 to 20 percent of the landscape in an early successional condition. This goal includes regeneration (0-to-10-year age class) and permanent openings with all properties contributing.

RECOMMENDED PRACTICES

- ✓ Develop habitat-composition goals for a property that include young forest as well as mature and older forest for a broad diversity of wildlife over time.
- ✓ Increase the use of group selection, patch and clearcut methods to diversify a closed canopy, increasing the gap size whenever possible.
- ✓ Regenerate shade-intolerant and mid-tolerant trees using shorter rotations, larger cuts, and site scarification.
- ✓ To increase the effective area of available early successional habitat spatially and over time, locate new groups, patches and clearcuts adjacent to temporary and permanent openings (i.e. utility corridor rights-of-way, scrub-shrub wetlands, frost pockets, and brushy old-fields).



CROSS REFERENCES

2.3 Regeneration Methods; 6.5 Permanent Openings; 6.7 Aspen Management; 6.8 Beaver-Created Openings; 7.4 Pine Barrens.

ADDITIONAL INFORMATION

DeGraaf, R., M. Yamasaki, W. B. Leak, and A. M. Lester. 2006. *Technical Guide to Forest Wildlife Habitat Management in New England*. University of Vermont Press and University Press of New England, Burlington, Vt. 305 p.