The following is an opinion by Steve McKee on the effects of timbering in the Mohican Complex. Mr. McKee is the Director of Gorman Nature in Mansfield, Ohio and worked with the Division of Forestry to outline a management plan for the Mohican State Forest. He is a well-respected botanist and naturalist, and has been exploring and botanizing in the Mohican Complex for well over thirty years.

## THE EFFECTS OF TIMBERING IN THE MOHICAN COMPLEX

## **Decreased Biodiversity**

Timbering causes a decrease in the amount of old-growth shaded forest, and in the plant and animal species that require this fairly uncommon habitat. Logging opens up more early-successional and "edge" habitat. For a while these edge areas actually increase in the number of species because there are more ecological niches to fill, but when you look at what those species are, logging actually causes a net decrease in biodiversity.

More edge habitat causes an increase in the species that are already abundant throughout most of Ohio, but it causes a decrease in the less common and rare species that require large areas of undisturbed forest for their habitat. The acres that are logged may increase some in biodiversity, but the region declines.

Timbering, especially in the vicinity or riparian areas, causes an increase in soil and water temperatures. Most of the waterways in Ohio are already far warmer than in presettlement times. It is the cool, clear waters that contain the less common and rare species of fish, invertebrates and aquatic plants.

Warmer drier soils extend a good ways into the forest on all sides of a logging zone. This can have a dramatic effect on moisture loving wildflowers and ferns.

## **Invasive Species Increase**

Most invasive species of plants, animals, and insects are able to get their foothold in disturbed areas. For example, multiflora rose, garlic mustard, autumn olive, and teasel (to name just a few) become problems rapidly in early successional and disturbed habitats. Compare any recently logged areas with old-growth forest, and you will see a dramatic difference in the number of invasive species.

Timbered areas also provide an entry avenue for Brown-headed Cowbirds that invade adjacent forest to parasitize the nests of forest-dwelling songbirds, such as warblers.

## **Decreased Tourism**

The economy of the Mohican area is tied primarily to tourism. Visitors to Mohican expect to see deep, cool, shaded forests. Tourism will certainly decline if Mohican is characterized by invasive shrubs, hot dry conditions, and vistas of stumps and slash.