



Michigan Invasive Plant Council

Michigan Plant Invasiveness Assessment System (MPIAS June 2008)

Acer platanoides, Norway maple

Summary and Recommendations for Michigan: *Acer platanoides*, Norway Maple is a large tree species, widely planted throughout much of North America, especially along urban streets, in parks and on residential properties. It is estimated as the most frequently planted and occurring street tree in the United States, with the majority of its use in the eastern and north central United States. *Acer platanoides* spreads by seed dispersal. Seeds are contained in winged samaras that are dispersed by wind. Seeds remain viable in the soil for less than 1 year. Requires open soil and disturbance to germinate. Significant predictors of young Norway maple abundance were distance to the nearest reproductive Norway maple (with most distances between 10 and 100 m) and degree of site disturbance. While the greatest densities of seedlings and saplings occur at woodland edges, occasional individuals occur a hundred meters from likely seed sources. Abundance of young seedlings and saplings were associated with disturbed sites and on those with nearby seed sources. Norway maple seedlings were less common on wet and dry sites than on mesic sites. The tree is rare in areas that are too wet, too dry or acidic (pH near 4).

Invasiveness in Michigan: *Acer platanoides*, Norway maple's potential invasiveness is considered low due to its reproductive ability and dispersal. Its invasiveness rank is considered medium across natural and managed systems with regional importance varying between insignificant and medium in the Upper and Lower Peninsula ecological regions. However, Norway maple is considered a problem when adjacent to or in close proximity to natural areas. Consult below for its responsible use. For more information consult the complete MPIAS assessment.

Value in Michigan: Recognized value is found in horticulture production and managed landscape systems.

Responsible Use: Norway maple's adaptive and reliable performance has led to wide spread use and the selection of numerous cultivars. It grows in a variety of soil conditions and tolerates urban stress associated with heat loads, air pollution, and road salt. Although it is reported to have up to 100 cultivars, we find approximately 20 available for use in Michigan. Seed dispersal is a problem when in close proximity to natural areas (10-100 meters). Understanding this behavior allows it to be used responsibly by not planting it adjacent to or in close proximity to natural areas (100 meters). In addition, seed production varies with selections within a species. *Acer p.* 'Crimson King' is a popular red leaved cultivar that has been used in diverse locations without any known dispersal in adjacent areas. Through cultivar selection and responsible placement, Norway maple can continue to serve urban and suburban landscapes without ill effects to natural areas.

Early detection rapid/response: Norway maple is easily identified by its leaf characteristics and terminal buds on its stems. Consult printed or on-line resources for pictorial descriptors of the plant.

Long term control/management: If Norway maple is already established in an area and has begun to compose all or some of the canopy, it is important that the large seed-source trees are removed first. If management of the area is long-term, then eliminating seed-bearing limbs, eventually leaving a standing dead tree available for habitation by natural residents of the forest such as woodpeckers, insects and rodents. However, if Norway maples management is short-term, then tree removal might be the best solution. Girdling large trees by cutting into the cambium layer around the trunk in a continuous ring is effective in killing them, typically within a couple of growing seasons. Herbicides are effective in speeding up the killing process by applying to both cut stumps and girdled trees. Chemical applications should be performed in accordance with the manufacturer's label. If only seedlings and saplings require removing, hand weeding may be the only process needed.

Restoration: Removal of Norway maple from a site may cause drastic changes in site conditions. While such efforts will be beneficial, there is also substantial risk of facilitating invasion by other undesirable plant species. In such case, a competent restoration ecologist should be consulted for an appropriate restoration plan.

For complete information from the Michigan Plant Invasiveness Assessment System
Consult: <http://invasiveplantsmi.org>