

European Buckthorn is My Favorite Plant: NOT!



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My students often joke that I describe every plant we study as my “favorite” plant. Though I am admittedly guilty of loving lots of different plants, I have never had many kind words for European buckthorn (*Rhamnus carthartica*). This European shrub was naively introduced to Minnesota in the mid-1800’s for hedges and it served this purpose well. In fact, it was a little too successful. European buckthorn has escaped cultivation and has spread extensively into the understory of so many woodlands that they are now officially considered “Restricted Noxious Weeds” and it is prohibited to import, sell, transport, or propagate them in the state.

Once European buckthorn becomes established it forms dense thorny thickets that shade out native plants and reduce species diversity. Bird populations also decline because native foods are reduced and the plants don’t provide suitable nesting sites. European buckthorn is able to out-compete our native vegetation because it leafs out early in the spring and stays green later in the autumn than our native species. Buckthorn also releases chemicals that inhibit the growth of neighboring plants (a phenomenon called allelopathy). To make matters worse, the berries and bark are toxic. They contain chemicals that cause diarrhea and vomiting if ingested. I’ve been told of a family who had a rather nasty experience after eating some jelly made from the berries. Birds avoid eating buckthorn berries if other foods are available because they, like us, suffer ill effects (*i.e.*, diarrhea). However, when they do eat the berries the undigested pigments in their dropping stain our house and sidewalks.

Fall is the best time of the year to control buckthorn. One reason is because buckthorn is readily spotted at this time of the year because it is the only shrub in the woods that still has green leaves. Small plants can be pulled out of the ground by hand or a root puller. Larger plants should be cut and the stump painted with a potent herbicide like Tordon™ or

RoundUp™. This procedure is most effective in the fall when the plant is moving nutrients from the stems into the roots. If you have limited time, especially focus on removing the female plant that produce berries – at least you will limit the potential spread of the plant.

Fortunately, buckthorn is not currently a problem in the St. John’s Arboretum. The few plants that have initiated an assault on our woodlands have been exterminated by the watchful arboretum staff. Unfortunately, St. Benedict’s is not quite so lucky. The campus woods are infested with European buckthorn.

In the fall we have periodic buckthorn eradication days. If you’d like to join us, contact me. In the meantime, check the woods around your home and get out the chain saw.

(this article was revised in Dec 2020 from one that originally appeared in Sagatagan Seasons)



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