

# Calumet Environmental Education Program

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## What is an invasive species?

An “invasive species” can be defined as a species that is non-native (or alien) to the local ecosystem and whose introduction causes or is likely to cause economic or environmental harm or harm to human health ([www.invasivespecies.gov](http://www.invasivespecies.gov)). Invasive species can be plants, animals or other organisms where human actions are the primary cause of introduction to the local ecosystem.

The introductions of invasive species can be either purposeful or accidental. While some species relocate to new habitats on their own (e.g. plants and animals found in the ballast water of a vessel, adhering to floating debris or migrating wildlife), human exploration and introduction have drastically increased the diversity and scale of invasions by exotic species. If introduced species do not find any natural predators or competition for resources in their new ecosystem, they can spread easily and quickly.

In Illinois and the Midwest, many of the invasive species are exotic, but not all exotic species are invasive, and not all invasive species are exotic. The Illinois Natural History Survey identifies that a number of our crop plants originated from elsewhere (e.g., corn from Mesoamerica, soybean from Asia) and some exotic plants (Queen Anne’s lace, purple loosestrife) are attractive, but invasive, while others (musk thistle) have few redeeming qualities. Species that are considered invasive often spread unchecked into new areas, disrupting habitats, affecting native species and even transforming ecosystems. Read more about Illinois’ invasive species in the enclosed *Exotic, Invasive Species in Illinois*, a publication of the Illinois Natural History Survey.

Human beings need to be more aware of

the effects invasive species can have on a local ecosystem and need to take action to protect native species from invasive species introduction and domination. Controlling the numbers and distribution of invasive and exotic species is extremely important in the struggle to preserve biodiversity in our local ecosystems.

A variety of methods exist to control existing invasive and exotic populations. Some of these methods include: biocides (chemicals or herbicides) to reduce or eradicate exotic species; constructing physical barriers to prevent the spread of exotic species; physical removal of invasive species; biological control through the introduction of a competing or predatory species; and public education to prevent the spread of invasive species [*Great Lakes Information Network*].

Some important facts about invasive and exotic species:

- It is estimated that invasive species cost the US over \$130 billion per year (invasive weeds causing over \$26 billion). [*Illinois Natural History Survey*]
- Roughly 40% of the species considered threatened or endangered in the US are due to the effects of invasive species. [*Illinois Natural History Survey*]
- Since the 1800s, more than 140 exotic aquatic organisms of all types - including plants, fish, algae and mollusks - have become established in the Great Lakes. More than one-third of the exotic species have been introduced in the past 30 years, a surge coinciding with the opening of the St. Lawrence Seaway. [*Great Lakes Information Network*] ■

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Synonyms:  
non-native  
alien  
non-indigenous  
exotic

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Important Dates:  
• January 18,19-  
Wolf Lake Winter  
Festival

• January 25-  
Purple Loosestrife  
Workshop

• February 20-  
Deadline for Illinois  
Arbor Day Poster  
Contest

• March 28- Educator  
Inquiry Group



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*For more definitions and information on invasive species check out:*

**A gateway to Federal and State invasive species activities and programs**

<http://www.invasivespecies.gov/>

**Illinois Natural History Survey**

<http://www.inhs.uiuc.edu/>

**Illinois-Indiana Sea Grant**

<http://www.iisgcp.org/edu/index.html>

**Great Lakes Information Network**

<http://www.great-lakes.net/envt/flora-fauna/invasive/invasive.html>

**Chicago Botanic Garden**

**Description of Enclosed Resources**

*Exotic, Invasive Species in Illinois*

A general description of the common invasive species in Illinois.

*Exotic, Invasive Species in Illinois – 2003 Calendar*

2003 monthly calendar highlighting a different invasive species each month. Check out the Monk Parakeet featured in January, which can be found at Wolf Lake!

*Illinois Exotic Species Coloring Book*

A great supplement to teach about exotic/invasive species, many of which can be found in the Calumet area.

*Chicago WILDERNESS Magazine – Spring 2002*

Check out the article on page 12, “Weed Meets Match” about a Chicago area kindergarten teacher who battled the illegal sale of purple loosestrife (an invasive) seeds on Ebay!

*Illinois-Indiana Sea Grant - Directory of Resources & Workshop Information*

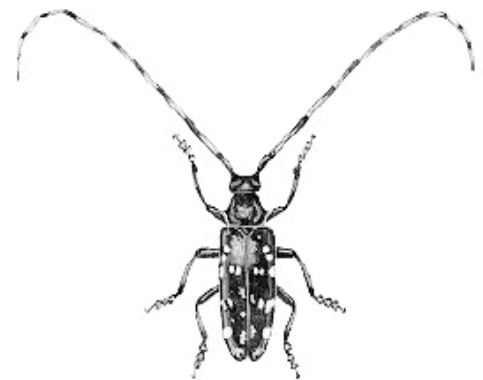
A listing of the resources available through this agency, with the focus on aquatic invasive species, which have been designed and field-tested by teachers for use in the classroom. Information on a workshop opportunity through this agency is also included.

*Illinois-Indiana Sea Grant – Traveling Trunks Information*

Information on two traveling trunks offered by this agency, Exotic Aquatics and Zebra Mussel Mania, including ordering and borrowing information.

*Purple Loosestrife & Eurasian Watermilfoil WATCH cards*

Quick information cards to take out in the field for easy identification. ■



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