The Problem: Negative Impacts of Invasive Species

economic and environmental effects on:

- Property Values
- Agricultural Productivity
- Tourism
- Outdoor Recreation
- Public Utility Operations
- Native Fisheries
- Natural Ecosystem
- Infrastructure

Bay-Lake RPC
Brown County Phragmites Management

Managed over 2,000 acres of Phragmites*

*chemical and mechanical treatment combined
East River, Brown County Treatments
Background

Identifying non-native invasive species:
Wild Parsnip, Japanese Knotweed, and Phragmites

Kewaunee County

Funding from EPA under the Great Lakes Restoration Initiative grants to address invasive species in Kewaunee County.

Past projects include:
• Kewaunee County, Wisconsin Emerald Ash Borer Readiness Plan,
• Two-year management of Phragmites in Brown County along the lower bay, Fox River, East River, Duck Creek, and Baird Creek.
Roadside Treatments

Kewaunee County

The impact of mowing and highway infrastructure

Bay-Lake RPC

- **F** • **M** • **A** • **M** • **J** • **J** • **A** • **S** • **O** • **N** • **D**
- **E** • **A** • **P** • **A** • **U** • **U** • **E** • **C** • **O** • **E**
- **B** • **R** • **R** • **Y** • **N** • **L** • **G** • **P** • **T** • **V** • **C**

- **2019**

- **County Mow**
  - 9’ ROW cut
  - June 1 – July 1

- **County Mow**
  - Labor Day – October 1
    - ROW to ROW

- **Wild Parsnip Treatment**

- **Phragmites and Japanese Knotweed Treatment**
The Invasive Species

**Phragmites**  
(*Phragmites australis*)  
Perennial wetland grass that grows 3-20’ tall with dull, very slightly ridged, stiff, and hollow stems. Create dense clones where canes remain visible in winter. Common reed alters hydrology and wildlife habitat, increases fire potential, and shades native species.

**Japanese Knotweed**  
(*Polygonum cuspidatum*)  
Plants reach up to 10’ and the dead stalks remain standing through the winter. Often occurs when soil contaminated with rhizomes is transported or are washed downstream during flooding. Poses a significant threat to riparian areas where it prevents streamside tree regeneration, and increases soil erosion.

**Wild Parsnip**  
(*Pastinaca sativa*)  
Grows as a rosette with upright leaves, persisting for at least 1 year. Flowering stems are stout and up to 5’ tall.

When sap contacts skin in the presence of sunlight, it can cause severe rashes, blisters, and discoloration of the skin.
Treatment Map

Outreach and Landowners

- Highway Departments
- Towns Association Meetings
- Roadside Training
- Landowner Permission Forms
- Interactive Map for Inventory Identification
- Graduation Student Interns
Planning Ahead

What phases are necessary to ensure control?
Long Term Planning Efforts

Phase 1
Outreach, Education, & Inventory
- GIS Mapping
- Identify location of invasive species and what type
- Work with residents to help control

Phase 2
Chemical & Mechanical Treatment
- Work with local environmental, economic, and transportation officials
- Plan maintenance and mowing with highway department

Phase 3
Management Plan
- Create an action plan with responsible parties for each task
- Budget maintenance annually
- Communicate timeline for prioritized invasive species