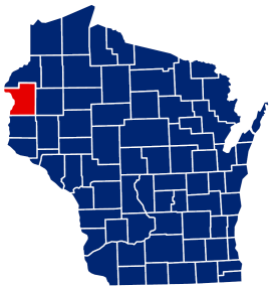


Polk County, Wisconsin Aquatic Invasive Species (AIS) Strategic Plan, 2015-2020

Prepared by Polk County Land and Water Resources Department

ACKNOWLEDGEMENTS

Polk County Aquatic Invasive Species Strategic Plan Workgroup Members

Angelique Edgerton, St. Croix River Association
Annette Viebrock, Church Pine, Round, and Big Lakes
Blaine Erickson, Loveless Lake
Bob Boyd, Bone Lake
Bob Goodlad, Cedar Lake
Byron Karns, National Park Service
Carl Holmgren, Balsam Lake
Chelsey Collette, Wisconsin Department of Natural Resources
Dan Bergeron, Big Round Lake
Derrick Carlson, Apple River Flowage
Dick Hollar, Pipe Lakes
Gordon Kill, Big Round Lake
Jeremy Williamson, Polk County Land and Water Resources Department
Jim Maxwell, Big Blake Lake
Joe Ziglinski, Lake Wapogasset/Bear Trap
John Wright, Deer Lake
Karen Engelbretson, Polk County Association of Lakes and Rivers
Katelin Holm, Polk County Land and Water Resources Department
Larry Bresina, Pipe Lakes
Lee Rickard, Lake Wapogasset/Bear Trap
Marianne Shira, Church Pine, Round, and Big Lakes
Mark Jacobson, Lake Wapogasset/Bear Trap
Roger Breault, Round Trade Lake
Roland Peterson, Apple River Flowage
Tim Anderson, Polk County Land Information Department
Tim Ritten, Polk County Land and Water Resources Department
Vicki Breault, Round Trade Lake
Wally Trudeau, Conservation Congress
Warren Nelson, County Board Supervisor
Wayne Wolsey, Bone Lake

Funding support provided by Wisconsin Department of Natural Resources Aquatic Invasive Species Control Grant AEPP-429-14.

Resolution # 34-15

Resolution Adopting the Polk County Aquatic Invasive Species Strategic Plan

TO THE HONORABLE SUPERVISORS OF THE COUNTY BOARD OF THE COUNTY OF POLK:
Ladies and Gentlemen:

WHEREAS, aquatic invasive species (AIS) have spread into watersheds in Polk County, posing increased risks to un-infested waters, and potentially threatening water quality, wildlife habitat, property values, and the tourism industry in the region; and

WHEREAS, the residents and professionals in and outside of the county understand that to address AIS effectively, many activities performed by many entities are needed; and

WHEREAS, the resulting plan identifies goals, objectives, and actions for implementation by many entities across the county to prevent, monitor, manage and control AIS in the county, and sustain these efforts into the future; and

WHEREAS, two public informational meetings were held and public comments were received, reviewed, and added to the plan where deemed necessary.

NOW, THEREFORE, BE IT RESOLVED THAT the Polk County Board of Supervisors approves and adopts the Polk County Aquatic Invasive Species Strategic Plan, attached hereto and incorporated herein.

Funding Source/ Funding Amount:	Not Applicable
Date Reviewed as to Appropriations:	Not Applicable
Committee Recommendation as To Appropriation:	Not Applicable
Effective Date:	Upon Passage
Dated Submitted To County Board	September 15, 2015
Submitted By:	
Review By County Administrator: ☒ Recommended ☐ Not Recommended ☐ Reviewed Only Dana Frey, County Administrator	Review By Corporation Counsel: ☒ Approved as to Form ☒ Recommended ☐ Not Recommended ☐ Reviewed Only

Acknowledgement of County Board Action
Mark As Appropriate:

At its regular business meeting on the 15th[th] of September 2015, the Polk County Board of Supervisors considered and acted on the above resolution, Resolution No. 34-15: Resolution Adopting the Polk County Aquatic Invasive Species Strategic Plan, as follows:

- ☐ Adopted by simple majority of the board of supervisors by a vote of _____ in favor and _____ against.
- ☒ Adopted by unanimous vote.
- ☐ Defeated by a vote of _____ in favor and _____against.
- ☐ Defeated by voice vote.
- ☐ Action Deferred by Procedural Action, as follows: _____

_____

_____

SIGNED BY: _____

William F. Johnson, IV, County Board Chairperson

Attest: _____

Carole T. Wondra, County Clerk

STATE OF WISCONSIN)
)SS
COUNTY OF POLK)

I, Carole T. Wondra, Clerk for Polk County, do hereby certify that the attached is a true and correct copy of Resolution No. 34-15, that was adopted by the Polk County Board of Supervisors on Sept. 15, 2015.

Carole T. Wondra 9-18-15
Carole T. Wondra Date

TABLE OF CONTENTS

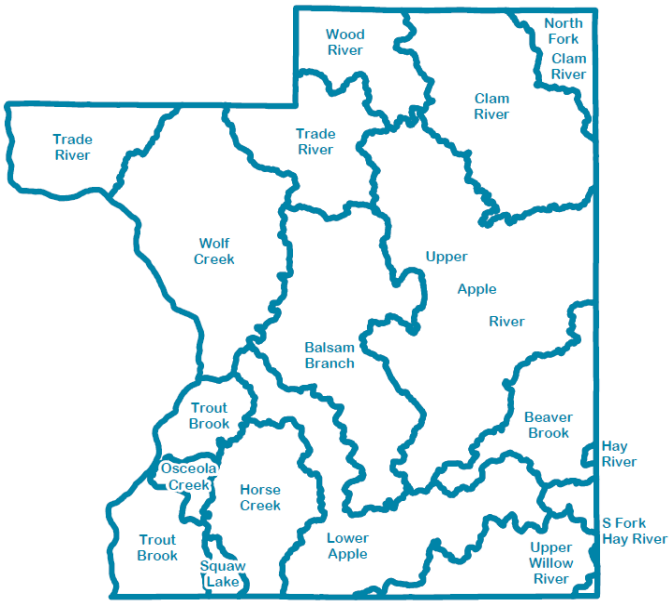
Introduction to Polk County 1
Introduction to Aquatic Invasive Species 3
Aquatic Invasive Species in Polk County 4
Aquatic Invasive Species Ordinances, Laws, Related Plans, and Databases 9
Polk County Land and Water Resources Department Aquatic Invasive Species Initiatives 11
Involvement in Statewide Aquatic Invasive Species Initiatives 12
Local Aquatic Invasive Species Initiatives 16
Grants to Address Aquatic Invasive Species in Polk County 18
Polk County Aquatic Invasive Species Strategic Plan Planning Process 20
Polk County Aquatic Invasive Species Implementation Plan 21

INTRODUCTION TO POLK COUNTY

Polk County is located in west-central Wisconsin, with its western border being formed by the St. Croix River, a National Scenic and Wild River. The county is bordered on the north by Burnett County, on the east by Barron County, on the south by St. Croix County, and on the west by Chisago and Washington County, Minnesota. Polk County is located northeast of the Minneapolis-St. Paul metropolitan area.

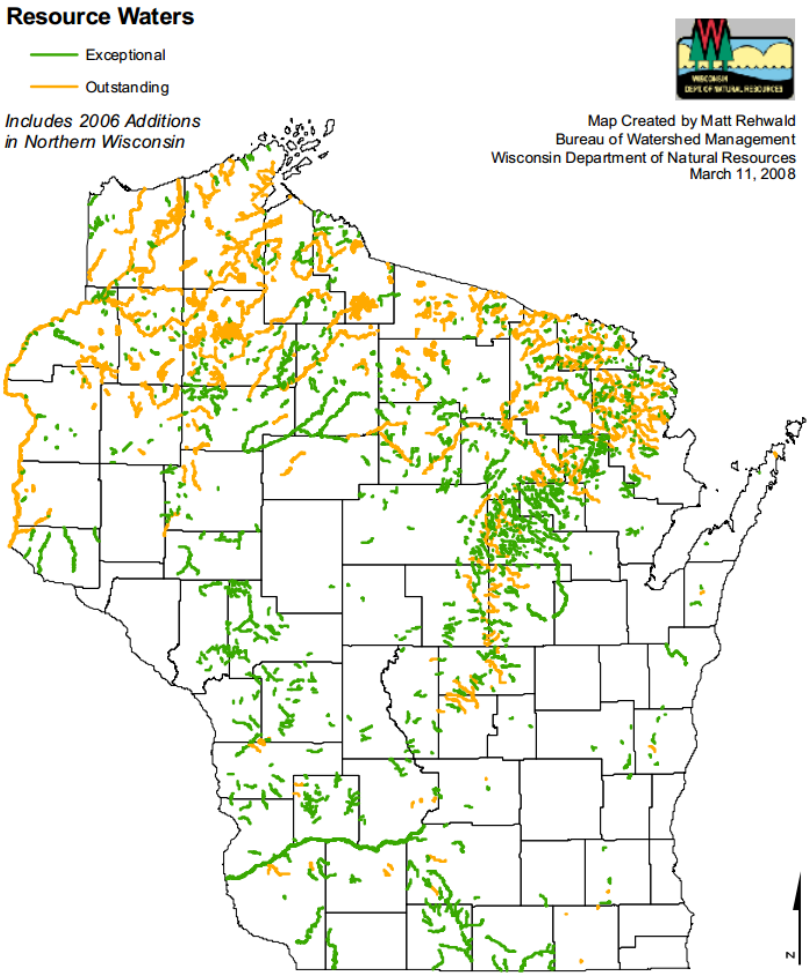
Polk County has a total surface area of 605,672 acres, or 946 square miles. Surface waters cover 24,960 acres or 39 square miles of Polk County. The county has 437 lakes totaling over 22,600 acres and 200 miles of rivers and streams, including 98 miles of trout streams. There are a total of 86 ramp access sites and 28 carry-in sites in Polk County which provide access to Polk County waterbodies.

The vast majority of Polk County falls in the St. Croix Basin, with the southeastern corner falling in the Lower Chippewa Basin. Major surface water drainage basins include Balsam Branch, Beaver Brook, Clam River, Horse Creek, Lower Apple River, North Fork Clam River, Osceola Creek, Squaw Lake, Trade River, Trout Brook, Upper Apple River, Upper Willow River, Wolf Creek, and Wood River in the St. Croix Basin and the Hay River and South Fork Hay River in the Lower Chippewa Basin.



Wisconsin has designated many of the state's highest quality waters as Outstanding Resource Waters or Exceptional Resource Waters. Waters with these designations provide outstanding recreational opportunities, support valuable fisheries and wildlife habitat, have good water quality, and are not significantly impacted by human activities.

Six Polk County waterbodies are classified as Outstanding Resource Waters (Clam River, McKenzie Creek, Orr Creek, Pipe Lake, Sand Creek/Tributaries, and portions of the St. Croix River) and ten are classified as Exceptional Resource Waters (Behning Creek, Big Rock Creek, Burns Creek, Knapp Creek, Little McKenzie Creek, Marquee Creek/Springs, Peabody Creek, the St. Croix River, Toby Creek/Springs, and Wolf Creek).



According to the Natural Heritage Inventory, Polk County has 90 rare species (15 fish and 14 mussels) and 30 natural communities.

The western boarder of the county is formed by the St. Croix River, an Outstanding and Exceptional Resource Water and National Wild and Scenic Waterway, which is classified as an Aquatic Invasive Species (AIS) Source Water. Well over 50% of the shore of the river is in public ownership, with public lands along the river including the Governor Knowles State Forest and Interstate State Park. Twelve boat access ramps and 11 carry-in sites provide access to the river from Polk County.

Polk County is generally rural with a 2010 population of 44,205. The population for 2000-2035 is projected to grow at a rate solidly above the state percentage (30%-48%). Over 20% of the county's total housing supplies are seasonal or recreational units. This large percentage results from Polk County's close proximity to the Twin Cities and its abundance of natural resources.

INTRODUCTION TO AQUATIC INVASIVE SPECIES

Aquatic invasive species (AIS) are non-indigenous species that dwell in water or wetlands whose introduction cause, or is likely to cause, economic or environmental harm or harm to human health. When AIS arrive in Polk County they have a competitive advantage over native species because they lack natural predators, parasites, pathogens, diseases, and competitors to keep their populations in check. As a result, populations of AIS can explode and outcompete native species by using available resources.

Additionally, many AIS have life strategies which give them a competitive advantage over native species. Strategies include high reproductive rates, early seasonal growth and development, and tolerance for a wide range of environmental conditions.

Invasive species can come from other parts of the United States or from other countries and can be released either intentionally or unintentionally. Modes and reasons for introduction can vary widely and include: ballast water for shipping, food sources, bait sources, and the garden/aquarium plant trade. Although some species may have been introduced through natural migration, humans are the primary way invasive species are spread.

AIS can displace native species; reduce wildlife habitat; and negatively impact property values, recreational activities, tourism, and industries.

AQUATIC INVASIVE SPECIES IN POLK COUNTY

To date there are documented populations of seven different AIS in Polk County: banded mystery snails, Chinese mystery snails, curly leaf pondweed, Eurasian water milfoil, Japanese/giant knotweed, purple loosestrife, and rusty crayfish. Additionally, zebra mussels are present just south of Polk County in St. Croix County.

The most common AIS in Polk County are curly leaf pondweed and Chinese mystery snails which are documented on 39 and 36 waterbodies, respectively. Banded mystery snails have been documented on 12 waterbodies, rusty crayfish on 10 waterbodies, purple loosestrife on 8 waterbodies, Japanese/giant knotweed on 7 waterbodies, and Eurasian water milfoil on 5 waterbodies.

Waterbody Name	Waterbody ID Code (WBIC)	Banded Mystery Snail	Chinese Mystery Snail	Curly-Leaf Pondweed	Eurasian Water Milfoil	Giant and Japanese Knotweed	Purple Loosestrife	Rusty Crayfish
Alabama Lake	2449200			x				
Antler Lake	2449400		x					
Apple River	2614000		x	x				x
Apple River Flowage	2624200			x				
Balsam Branch	2618300			x				x
Balsam Lake	2620600		x	x		x	x	
Bear Trap Lake	2618100		x	x				
Big Blake Lake	2627000	x	x	x		x		
Big Butternut Lake	2641000	x	x	x				
Big Lake	2615900	x	x	x		x	x	
Big Round Lake	2627400			x				
Black Brook Flowage	2621900	x	x	x				
Bone Lake	2454400	x		x				
Bone Lake	2628100	x	x	x				
Camelia Lake	2079400		x					
Cedar Lake	2615100		x	x	x	x		
Church Pine Lake	2616100		x					
Clam Falls Flowage	2666400		x	x				
Clear Lake	2623500		x					
Deer Lake	2460500			x				
Deer Lake	2619400		x	x				
Fox Creek	2626800							x
Grimhs Lake	2467400						x	
Half Moon Lake	2621100	x	x	x				x
Herby Lake	2468900			x				
Horse Lake	2616200			x				
Horseshoe Lake	2470100		x					
Horseshoe Lake	2630100			x	x			
Lake O' the Dalles	2634200			x				

Waterbody Name	Waterbody ID Code (WBIC)	Banded Mystery Snail	Chinese Mystery Snail	Curly-Leaf Pondweed	Eurasian Water Milfoil	Giant and Japanese Knotweed	Purple Loosestrife	Rusty Crayfish
Little Butternut Lake	2640700			x		x		
Little Mirror Lake	2477100			x				
Long Trade Lake	2640500			x	x			
Lotus Lake	2616900						x	
Loveless Lake	2620000			x				
Lower Pine Lake	2479900		x					
Magnor Lake	2624600	x	x	x				
McKenzie Lake	2667300		x					
Mud Lake	2619100			x				
North Pipe Lake	2485700	x	x					
North Twin Lake	2623900		x	x			x	
North White Ash Lake	2628800	x	x	x			x	
Osceola Creek	2632700							x
Pike Lake	2624000		x	x	x			
Pine Lake	2489900		x					
Pine Lake	2490400		x	x				
Pipe Lake	2490500		x					
Round Lake	2616400			x				
Sand Lake	2495000		x	x				
Sandhill Lake	2495400		x	x				
Silver Lake	2496700		x				x	
South Twin Lake	2623800		x					
St. Croix River	2634400				x	x		x
Staples Lake	2631200	x	x	x				
Swede Lake	2500500		x					
Trade River	2636000							x
Unnamed	2658800			x				
Wapogasset Lake	2618000		x	x		x		x
Ward Lake	2599400		x					
White Ash Lake	2628600		x	x			x	
Willow River	2606900							x
Wood River	2642900							x

Banded Mystery Snails are native to the southeastern United States, being found primarily in the Mississippi River System up to Illinois. This invasive snail species is popular in the aquarium trade which likely explains it's presence outside its native range.

Besides causing aesthetic problems, banded mystery snails can cause mortality of largemouth bass embryos if nests are invaded. The banded mystery snail is easily distinguished by the presence of reddish bands which are arranged parallel to the whorl of the shell.

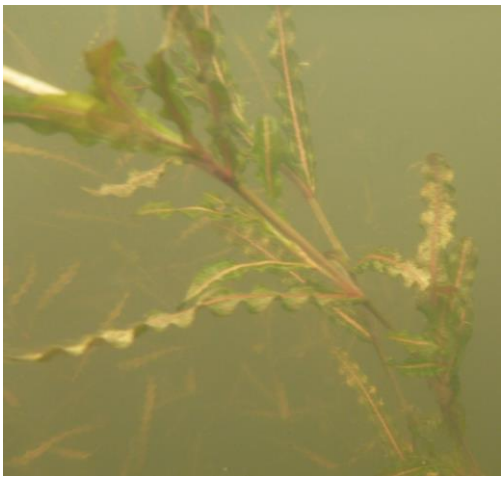
Banded mystery snails were first documented in Polk County in 2003 in Half Moon Lake. Although their spread had continued, they are still much less common in Polk County as compared with the Chinese mystery snail. They have been documented on only 12 Polk County waterbodies.

Chinese Mystery Snails were imported to the west coast in the late 1800's as a food source for the Asian market and have spread via aquarium release and other accidental and intentional introductions. When introduced to a new waterbody, the Chinese mystery snail alters the ecosystem composition, structure, and function by competing with native snails for food and space.

Populations of Chinese mystery snails are established in many Northern Wisconsin lakes and have been documented in 36 Polk County waterbodies.

Curly Leaf Pondweed is a submerged aquatic invasive plant. The leaves of curly leaf pondweed are easily distinguished by their rounded tip, prominent mid-vein, and finely toothed edges. In certain growing conditions, the leaves appear wavy or crimped.

Curly leaf pondweed is found in a wide variety of habitats, although it prefers alkaline and high nutrient waterbodies and typically grows in less than 3 meters of water.



This invasive species outcompetes native aquatic plants because it exhibits rapid growth in the early spring, sometimes growing beneath ice cover. Curly leaf pondweed forms large, dense mats on the surface of waterbodies inhibiting the light necessary for native plant growth and interfering with navigation and recreational activities.

Curly leaf pondweed was first discovered in Polk County in the Apple River Flowage in 1977. It has been documented in 39 waterbodies in Polk County.

Eurasian Water Milfoil is a submerged aquatic invasive plant with delicate, feather-like leaves arranged in a whorl around the stem of the plant. It can be distinguished from native milfoils by the 12-21 leaflets making up each leaf.

Eurasian water milfoil is capable of forming large, thick mats which interfere with recreational uses. It can have devastating impacts on native ecosystems, displacing native aquatic plants and impacting fish and wildlife populations.

Eurasian water milfoil was first discovered in North America in the 1940's. Since this time it has invaded nearly every state in the United States. Eurasian water milfoil spreads when small fragments of the plant break off, form new plants, and float on water currents or are transported by boater traffic.

Establishment of Eurasian water milfoil populations in Polk County has occurred relatively recently, being first found in Long Trade Lake in 1995. Long Trade Lake is part of the Trade River System, which includes Little Trade, Big Trade, and Round Lakes in Burnett County. Eurasian water milfoil was discovered in Round Lake in 2003 and in Little Trade Lake in 2009. Eurasian water milfoil was found in Horseshoe Lake in 2006, in Pike Lake in 2010, in the St. Croix River between Spanglers Landing and Lions Park Landing in 2013, and in Cedar Lake in 2015. Eurasian water milfoil is currently documented on 5 Polk County waterbodies.

Japanese and Giant Knotweed are native to Asia and were imported to the United States in the mid 1900's as ornamental plants, although they are becoming more prevelant in the wild. The plant can reach up to fifteen feet and is easily distinguished by hollow bamboo-like stalks.

Knotweed is a perennial, meaning that each spring it re-grows from an extensive root system. Both species grow extremely fast and form a dense canopy of foliage which blocks sunlight from reaching the ground. As a result, native vegetation is unable to grow beneath a knotweed stand. When knotweed establishes on stream banks, the lack of understory can promote intense erosion causing soil and knotweed roots to move downstream.

Knotweed was first discovered in Polk County in 2009. In 2012 and 2013 knotweed control measures were conducted by Polk County LWRD under an early detection and response grant. Knotweed has been documented at 93 sites in Polk County and on 7 waterbodies.

Purple Loosestrife is an aquatic invasive perennial plant that grows 3-7 feet tall and develops a spike of small purple flowers in late summer. The leaves are oblong and arranged oppositely along a square shaped stem. Purple loosestrife spreads rapidly and colonizes wetlands, shorelines, and roadside ditches. Thick stands of purple loosestrife crowd out native vegetation and reduce food, shelter, and nesting sites for a variety of wildlife.

This plant, native to Europe and Asia, was introduced in North America in the 1800's for beekeeping and as a garden ornamental. Purple loosestrife has been present in Polk County for many years. An inventory was conducted in 2000 by Polk County LWRD to identify the extent of purple loosestrife and to reduce its spread. Purple loosestrife is currently documented on 8 Polk County waterbodies.

Rusty Crayfish are invasive crustaceans that can have profound impacts on lakes, rivers, and streams. They are more aggressive and are better able to avoid predation than native crayfish. Rusty crayfish can be identified by the rust colored spots on the hard part of their upper shell. They can also harm native fish populations by eating their eggs and young.

Rusty crayfish are currently documented on 10 Polk County waterbodies.

Zebra Mussels are aquatic invasive mussels with a D-shaped shell exhibiting alternating black and white stripes. Since they are able to attach to hard surfaces, zebra mussels can clog water intakes and damage equipment such as boat motors. When water bodies are infested with zebra mussels their shorelines become littered with sharp shells, impeding human recreational opportunities. Additionally, zebra mussels damage ecosystems by harming fisheries and smothering native mussels, snails, and crayfish.

Zebra mussels arrived in the Great Lakes in the late 1980's from contaminated ballast water. Since that time they have expanded in range via the Mississippi River. Zebra mussels have not been found in Polk County; however, in 2010 they were discovered in Bass Lake in St. Croix County.

AQUATIC INVASIVE SPECIES ORDINANCES, LAWS, RELATED PLANS, AND DATABASES

In 2001, the Wisconsin Legislature directed the Department of Natural Resources to establish a statewide program to control invasive species and to promulgate rules to identify, classify, and control invasive species for purposes of the program. By 2004, the Wisconsin Council on Invasive Species formed to assist WDNR with this task.

As a result, on September 1, 2009 the WDNR created Wisconsin's Invasive Species Identification, Classification, and Control Rule, Chapter NR 40, Wisconsin Administrative Code. The rule helps citizens learn to identify and minimize the spread of plants, animals and diseases that can invade our lands and waters and cause significant damage.

The invasive species rule creates a comprehensive, science-based system with criteria to classify invasive species into two categories: prohibited and restricted. With certain exceptions, the transport, possession, transfer, and introduction of prohibited species is banned. Restricted species are also subject to a ban on transport, transfer, and introduction, although possession is allowed, with the exception of fish and crayfish.

Wisconsin has various laws in place to prevent the introduction and control the spread of AIS and diseases in Wisconsin.

Wisconsin Transport Laws for Boaters and Anglers

- INSPECT your boat, trailer and equipment.
- REMOVE any attached aquatic plants or animals (before launching, after loading and before transporting on a public highway).
- DRAIN all water from boats, motors, and all equipment.
- NEVER MOVE live fish away from a waterbody.
- DISPOSE of unwanted bait in the trash.
- BUY minnows from a Wisconsin bait dealer. You may take leftover minnows away from any state water and use them again on that same water. You may use leftover minnows on other waters only if no lake or river water, or other fish were added to their container.

In 2008, the Polk County Illegal Transport of Aquatic Plants and Invasive Animals Ordinance was adopted, making it illegal to operate or transport equipment with aquatic plants or invasive animals attached. Public input into the decision making process was sought through public meetings which were advertised

in local papers. The Ordinance was amended in 2011 to include language regarding liability of a vehicle, watercraft, trailer, or equipment of the owner or lessor. Polk County LWRD purchased and installed ninety metal ordinance signs in 2009. In 2011, LWRD staff worked closely with local law officials to ensure enforcement of the amended ordinance.

The Polk County Land and Water Resource Management Plan, 2009, adopted by the County Board and approved by the state describes the strategy LWRD will employ to address the factors that affect the natural resources of Polk County. Goal 1, Objective 1A pertains to AIS:

Goal 1. Protect the water quality of our groundwater, lakes, streams, rivers, creeks, and associated ecosystems.

Objective 1A. Prevent, control, or eliminate AIS to protect the integrity of our surface water resources.

1. Educate water users, lake groups, and special parties (fishing groups) of the impact, spread, and peril of AIS.
2. Monitor waterbodies for the presence/absence or extent of invasion.
3. Create a plan for invasive species management.
4. Use volunteers and interns whenever possible.
5. Employ strategies to keep native ecosystems intact.
6. Work with other agencies to coordinate programs and provide information.

The St. Croix River Association is currently in the process of developing an AIS Strategic Plan for the St. Croix River Watershed. Polk County was represented at the planning meetings.

Polk County does not currently have its own AIS database. Data that is collected in accordance with statewide protocols or through statewide programs such as Clean Boats, Clean Waters are entered into the WDNR Surface Water Integrated Monitoring System (SWIMS) database. A username and password is required to enter data into SWIMS, making this database only accessible to trained volunteers. Many forms of data, in addition to AIS information, can be entered into SWIMS.

Much of the data entered into SWIMS is readily available on the WDNR website without a login. The locations of AIS can be found on the WDNR Surface Water Data Viewer at: http://dnrmaps.wi.gov/sl/?Viewer=SWDV and Clean Boats, Clean Waters data and graphs can be found at: http://dnr.wi.gov/lakes/cbcw/. Additionally, WDNR grant details can be found at: http://dnr.wi.gov/lakes/grants/Projects.aspx?location=.

The Great Lakes Indian Fish and Wildlife Commission (GLIFWC) also maintains a website for viewing AIS locations in Michigan, Minnesota, and Wisconsin available at http://invasives.glifwc.org/.

Polk County Land and Water Resources Department Aquatic Invasive Species Initiatives

AIS efforts by Polk County LWRD have been primarily funded with support from WDNR grants. The county's first grant was received in 2008 and two additional grants have been awarded since this time. Additionally, a rapid response grant for Japanese Knotweed was awarded to Polk and Burnett Counties in 2009. The efforts of LWRD can be organized into three categories detailed below: education, monitoring, and control. Many of these efforts occur with statewide and local support.

Education

LWRD provides AIS education and information to any group requesting it. Support ranges from providing brochures and specimens for meetings, creating display boards, or presenting programs. In a typical year, LWRD attends and gives presentations at lake organization's annual meetings, community events, schools, and libraries. LWRD submits WDNR press releases customized for Polk County to local newspapers and authors AIS newsletter articles for lake organizations when requested. Beginning in 2011, LWRD has been a bi-weekly featured guest on WPCA radio, which provides an avenue for communicating AIS updates to the public. LWRD has also filmed and produced YouTube videos with an AIS message. In 2010, Polk County LWRD designed a two page color advertisement regarding invasive species and the Polk County Illegal to Transport Ordinance for the Polk County Visitors Guide.

LWRD provides support and training for all statewide AIS programs including: Project RED, Citizen Lake Monitoring, Clean Boats, Clean Waters, the Landing Blitz, the Draining Campaign, and the Bridge Snapshot Day. In the past, LWRD has provided county-wide trainings and individual lake organization trainings.

Monitoring

Since 2001, LWRD has participated in the statewide AIS early detection smart prevention protocol. This protocol was adapted and used to monitor the St. Croix River in 2013. Since Eurasian water milfoil is only established in four Polk County waterbodies, LWRD also monitors lakes in the vicinity of Eurasian water milfoil lakes for this early detection species. With the discovery of zebra mussels in northern St. Croix County, LWRD has also monitored lakes near the county border for zebra mussels. Most knotweed and purple loosestrife sites are located when traveling across the county to project sites or from concerned landowner contact.

Control

LWRD has been most involved with controlling knotweed and purple loosestrife. Knotweed has been managed in Polk County since 2009 and purple loosestrife since 2000. Knotweed and small stands of purple loosestrife are managed with herbicide and *Galerucella* beetles are used as a biological control for large stands of purple loosestrife. In 2014, LWRD partnered with the National Park Service, St. Croix River Association, St. Croix Tribal Youth Program, and volunteers to hand pull Eurasian water milfoil on the St. Croix River.

INVOLVEMENT IN STATEWIDE AQUATIC INVASIVE SPECIES INITIATIVES

The WDNR offers support for implementing a variety of statewide AIS initiatives. Whenever possible, these initiatives are implemented in Polk County.

Clean Boats, Clean Waters

Through the Clean Boats, Clean Waters program, inspectors are trained to organize and conduct a boater education program in their community. Adults and youth teams educate boaters on how and where invasive species are most likely to hitch a ride into waterbodies. Inspectors perform boat and trailer checks for invasive species, distribute informational brochures, and collect and report any new water body infestations.

Clean Boats, Clean Waters programs were implemented at thirty landings on twenty-one Polk County waterbodies from 2012-2014. In 2014 in Polk County, 6,006 boats were inspected and 11,428 people were contacted with the Clean Boats, Clean Waters message. During this season, approximately half of boaters (47%) had not already been contacted by an inspector, a quarter (23%) had used their boat on a different waterbody in the past 5 days, and inspectors felt confident that three-quarters (76%) of boaters understood the steps necessary to prevent the spread of AIS.

LWRD provides county-wide and individual waterbody trainings for the Clean Boats, Clean Water Program. The most recent county-wide training occurred in 2015.

Landing Blitz

The Landing Blitz is a media campaign completed as part of the Clean Boats, Clean Waters program. To assist local participants, WDNR provides partner groups with template media releases, outreach materials, and free towels to be handed out to boaters practicing AIS prevention steps. The Landing Blitz occurs over the Fourth of July weekend, the busiest time of the boating season. Over this single weekend in 2014, 666 boats were inspected and 1,270 people were contacted in Polk County with the Clean Boats, Clean Waters message. LWRD mails out a county-wide press release to promote the event and serves as a pick up site for supplies.

Clean Boats, Clean Waters Story Hour

The Clean Boats, Clean Waters Story Hour is a tutorial for educators interested in providing AIS information to children. The program includes a template lesson plan for the program and example hands on activities.

In 2012, LWRD made contact with all Polk County libraries and implemented the program at seven libraries and one youth camp. On an average year, LWRD visits three libraries and incorporates AIS messaging into the program.

Project RED (Riverine Early Detectors)

Project RED is a monitoring program that trains volunteers to identify and report invasive species within river corridors statewide. During a Project RED training, volunteers learn which invasive species threaten their local rivers, how to differentiate them from native look-a-likes, and how to keep an eye out for them by canoe, kayak, or on foot. The training includes a paddle where AIS monitoring protocols are implemented. After the training, participants choose a location to monitor that is convenient for them and record their findings in the WDNR statewide database.

The most recent Polk County Project RED training took place in 2015. Additionally, one training session was offered in 2014 and two training sessions were offered in 2013. These trainings were offered through a partnership between the National Park Service, the Polk County Land and Water Resources Department, the River Alliance of Wisconsin, and the St. Croix River Association.

AIS Bridge Snapshot Day
Initiated in 2014, this project trains volunteers to identify and search for target AIS of concern to Wisconsin's rivers. Volunteers from across the state monitored over 180 sites ranging from public parks on large rivers to small culverts on county roads on a single day in the fall of 2014.

The Polk County Land and Water Resources Department and the St. Croix River Association partnered to offer this opportunity to benefit Polk County waterbodies in 2014 and 2015.

Citizen Lake Monitoring: AIS
The goals of the Citizen Lake Monitoring Network are to collect high quality data, educate and empower volunteers, and share information. The program provides volunteers with necessary equipment and training to conduct AIS monitoring activities on their waterbody. Most volunteers complete the monitoring protocols a few times per year at high risk sites around their lakes to detect early populations of AIS.

The most recent Polk County AIS Citizen Lake Monitoring Training was held in 2015.

Draining Campaign
The goal of the Draining Campaign is to ensure that anglers understand Wisconsin's draining laws, why they are important, and easy ways to comply. This program was developed in response to research showing that Wisconsin's AIS laws against the transport of water and live fish are not well understood and practiced by the angling community.

The Draining Campaign provides partner groups with education materials, template press releases, laminated posters, and free ice packs to hand out to anglers. LWRD mails out a county-wide press release to promote the event and serves as a pick up site for supplies.

Bait Dealer Initiative
The Bait Dealer Initiative is a toolkit containing informational materials for bait shops and their customers. The toolkit provides participating bait dealers with brochures, frequently asked question cards, floating key chains, and bait bucket stickers for anglers. Additionally, participating bait shops receive media advertisements and a certificate of participation.

AIS Early Detection Smart Prevention Protocol
Since 2011, LWRD has been implementing the statewide AIS early detection smart prevention protocol for Polk County. The protocol is an extensive effort to monitor for AIS involving meandering the shoreline, throwing rakes to examine the aquatic plant community, using zooplankton tows to determine presence or absence of spiny water fleas and zebra mussels, and snorkeling. Thirty-five Polk County lakes have been monitored using this protocol.

Water Guards
Water Guards are WDNR Deputy Conservation Wardens who perform law enforcement duties to protect Wisconsin lakes, rivers, and streams. Their efforts are aimed at ensuring compliance with Wisconsin's laws related to preventing the spread of aquatic invasive species and aquatic diseases. Through this program, decontamination units are available on a first come first serve basis. The Water Guard that covers Polk County is based out of Eau Claire. In July 2015, the Polk County Land and Water Resources Department, St. Croix River Association, Wisconsin Department of Natural Resources, the Town of Garfield, and the Lake Wapogasset and Bear Trap Lake Sanitary District partnered to bring a decontamination unit to Garfield Park on Lake Wapogasset and the Lions Park on the St. Croix River.

AIS Boat Landing Signs
In 2010, WDNR developed a new AIS sign for boat landings. The new signs (which are black, white, and red) are meant to replace all old AIS signs (typically with a green background).

Polk County LWRD has made these free signs available to lake organizations and has also installed signs at boat landings without active organizations. As a result the vast majority of Polk County landings have the new signage installed.

LOCAL AQUATIC INVASIVE SPECIES INITIATIVES

Thirty Polk County waterbodies are managed by organizations, with half of these waterbodies being managed by a District with taxing authority. These organizations are very active in implementing local AIS initiatives.

Kiosks

Boat landing kiosks provide an opportunity for lake organizations to provide additional AIS messaging to waterbody users. Kiosks typically display general information such as lake maps, slow no wake areas, and fishing regulations. Many also include AIS messaging such as photos of AIS which are already present or a particular threat, laws and regulations, and contact information to report AIS.

Polk County waterbodies with additional AIS messaging at kiosks include: Balsam Lake, Big Blake Lake, Big Butternut Lake, Big Round Lake, Big, Round and Church Pine Lakes, Bone Lake, and Pipe Lakes.

I-LIDS

I-LIDS cameras provide an extra level of prevention by monitoring boat landing activities with video footage. A sensor, triggered by the presence of a vehicle or trailer, records video footage of the boat landing and plays a recording to prompt compliance with AIS laws. Images are stored for review to determine waterbody users who aren't complying with AIS laws.

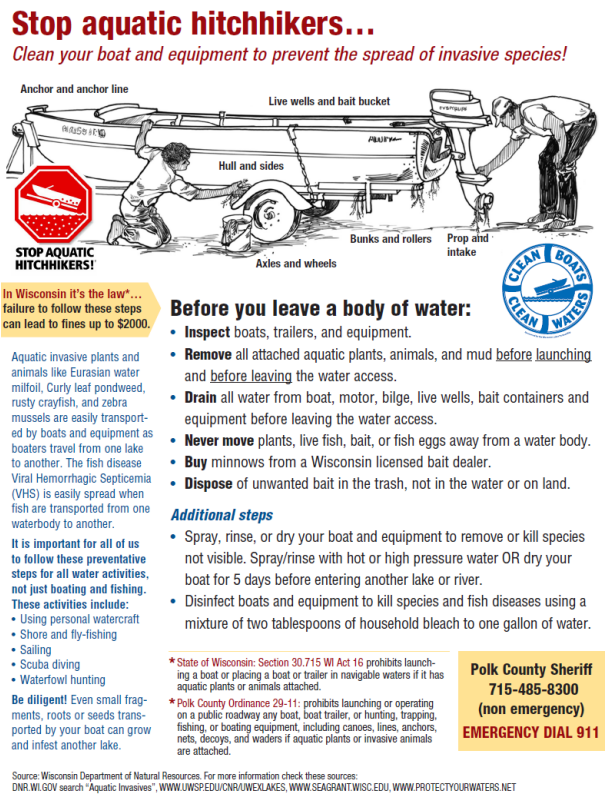
Church Pine Lake, Big Round Lake, Bone Lake, and Half Moon Lake currently have I-LIDS cameras installed at their boat landings.

Bait Stickers

In 2009, the Polk County Association of Lakes and Rivers and the Polk County LWRD developed Stop Aquatic Hitchhiker stickers for bait containers as a means to communicate AIS laws to anglers. Rolls of stickers were distributed to local bait shops and handed out at local events.

Lake Maps

Polk County LWRD, the Polk County Association of Lakes and Rivers, and ten lake and river organizations partnered to produce individualized lake maps with AIS messaging. The flyer was first designed and produced for Bone Lake to put AIS prevention messaging in the hands of visitors and property owners as a useful map for recreation and fishing. The two-sided flyers are printed in full color on standard size waterproof paper. One side of the flyer has a contour bathymetric map of the lake with relevant information such as maximum depth, acres, and species of fish present and the other side of the flyer has AIS prevention information, Clean Boats, Clean Waters information, and emergency numbers.



Stop aquatic hitchhikers…

Clean your boat and equipment to prevent the spread of invasive species!

Anchor and anchor line
Live wells and bait bucket
Hull and sides
Bunks and rollers
Prop and intake
Axles and wheels
STOP AQUATIC HITCHHIKERS!

In Wisconsin it's the law*… failure to follow these steps can lead to fines up to $2000.

Aquatic invasive plants and animals like Eurasian water milfoil, Curly leaf pondweed, rusty crayfish, and zebra mussels are easily transported by boats and equipment as boaters travel from one lake to another. The fish disease Viral Hemorrhagic Septicemia (VHS) is easily spread when fish are transported from one waterbody to another.

It is important for all of us to follow these preventative steps for all water activities, not just boating and fishing. These activities include:
- Using personal watercraft
- Shore and fly-fishing
- Sailing
- Scuba diving
- Waterfowl hunting

Be diligent! Even small fragments, roots or seeds transported by your boat can grow and infest another lake.

Before you leave a body of water:
- **Inspect** boats, trailers, and equipment.
- **Remove** all attached aquatic plants, animals, and mud before launching and before leaving the water access.
- **Drain** all water from boat, motor, bilge, live wells, bait containers and equipment before leaving the water access.
- **Never move** plants, live fish, bait, or fish eggs away from a water body.
- **Buy** minnows from a Wisconsin licensed bait dealer.
- **Dispose** of unwanted bait in the trash, not in the water or on land.

Additional steps
- Spray, rinse, or dry your boat and equipment to remove or kill species not visible. Spray/rinse with hot or high pressure water OR dry your boat for 5 days before entering another lake or river.
- Disinfect boats and equipment to kill species and fish diseases using a mixture of two tablespoons of household bleach to one gallon of water.

* State of Wisconsin: Section 30.715 WI Act 16 prohibits launching a boat or placing a boat or trailer in navigable waters if it has aquatic plants or animals attached.
* Polk County Ordinance 29-11: prohibits launching or operating on a public roadway any boat, boat trailer, or hunting, trapping, fishing, or boating equipment, including canoes, lines, anchors, nets, decoys, and waders if aquatic plants or invasive animals are attached.

Polk County Sheriff
715-485-8300
(non emergency)
EMERGENCY DIAL 911

Source: Wisconsin Department of Natural Resources. For more information check these sources: DNR.WI.GOV search "Aquatic Invasives", WWW.UWSP.EDU/CNR/UWEXLAKES, WWW.SEAGRANT.WISC.EDU, WWW.PROTECTYOURWATERS.NET

The flyers currently exist for: the Apple River Flowage, Balsam Lake, Big Blake Lake, Big Butternut Lake, Big Round Lake, Big, Round, and Church Pine Lakes, Bone Lake, Lake Wapogasset/Bear Trap Lake, Long Lake, and Pipe and North Pipe Lakes.

AIS messaging is updated when reprints are ordered. Reprints are ordered in quantity to save each organization printing and shipping costs. The uses for the flyers are many, with organizations mailing copies to residents, leaving flyers at the boat landing, or incorporating the flyers into existing Clean Boats, Clean Waters programs.

Billboard

In August 2012, an AIS billboard was installed along HWY 87 north of the Lions Park in St. Croix Falls. The billboard was designed by the Wisconsin Lakes Partnership and organized by LWRD with support from WDNR.

In 2014, LWRD partnered with the Bone Lake Management District and Wildlife Forever to locate billboard space along HWY 8 near the Minnesota border. The AIS billboard was funded by the Bone Lake Management District with support from WDNR.

GRANTS TO ADDRESS AQUATIC INVASIVE SPECIES IN POLK COUNTY

Polk County lake organizations have been extremely active in AIS management, with the first WDNR AIS grant being applied for in 2004. Since this time a total of forty-four AIS grants have been awarded to Polk County lake organizations. Although many lakes implement AIS activities outside of grant funding, the WDNR grant program awards provide a thorough summary of many AIS projects at the county level.

The WDNR awards grants to public and private entities for up to 75% of the costs of projects to control AIS. There are five WDNR AIS Prevention and Control Grants subprograms.

- Education, Prevention, and Planning Projects (including Clean Boats, Clean Waters)
- Early Detection and Response Projects
- Established Population Control Projects
- Maintenance and Containment Projects
- Research and Demonstration Projects

Education, Prevention, and Planning Projects are intended to broaden the public's awareness and understanding of AIS, threats they pose to the health of aquatic ecosystems, measures to prevent their spread, and management practices used for their control. These projects are intended to prevent the introduction and spread of AIS into a waterbody/wetland.

This grant program is the most commonly awarded in Polk County, with most applications including a Clean Boats, Clean Waters program. Educational initiatives funded with this grant program include improved signage, workshops, brochures, mailings, participation in the Landing Blitz program, and lake fairs. Additional projects funded with this grant program include monitoring for invasive species, point intercept plant surveys, aquatic plant management plan development, and camera monitoring.

Early Detection and Response Projects provide funds for the early identification and control of pioneer populations of AIS before they become established. These projects are intended for waters and wetlands where the presence of AIS is relatively new and the area of coverage is limited such that there is a high likelihood that they can be removed or significantly reduced and managed at low densities.

In Polk County, this program has been primarily used to respond to new populations of Eurasian water milfoil. Grants have been used to monitor plant populations and remove Eurasian water milfoil with chemical or manual treatment. These grants have included the creation of aquatic plant management plans and education initiatives including workshops, websites, and signage. This grant program has also been used to monitor and control pioneer populations of knotweed in Polk County and to determine treatment efficacy.

Established Population Control Grants are intended to assist in eradicating or substantially reducing established populations of AIS to protect and restore native species communities.

In Polk County, these grants have been used primarily to treat curly leaf pondweed with herbicide or less frequently, through harvesting. Treatments often involve pre/post treatment aquatic plant surveys, bed mapping, and turion monitoring, and have included herbicide concentration monitoring. Other species chemically or manually controlled through this grant program include Eurasian water milfoil, purple loosestrife, and giant knotweed. Removal projects typically involve monitoring and mapping. Additional projects have included watercraft inspections, automated video surveillance, aquatic plant management plan updates, planting of native aquatic plants, and educational efforts such as signage and newsletters.

Maintenance and Containment Projects are intended to provide sponsors limited financial assistance for the ongoing control of established AIS populations. These projects are intended for waters where management activity has achieved the target level of control identified in an approved plan. Ongoing maintenance is needed to contain these populations so they do not re-establish throughout the waterbody, spread to other waters, or impair navigation and other beneficial uses of the waterbody.

At this time, this grant program has not been used by Polk County lake organizations.

Research and Demonstration Projects are intended as a cooperative activity between applicants and the WDNR. Projects are designed to increase scientific understanding of the ecological and economic implications of AIS and its management and to assess experimental and innovative techniques for AIS prevention, containment, and control.

At this time, this grant program has not been used by Polk County lake organizations.

POLK COUNTY AQUATIC INVASIVE SPECIES STRATEGIC PLAN PLANNING PROCESS

In 2014, LWRD received a WDNR Aquatic Invasive Species Education, Prevention, and Planning Grant to address the spread of aquatic invasive species at the county level. One deliverable of this grant was to create a Polk County Aquatic Invasive Species Strategic Plan.

Using existing county, regional, and state aquatic invasive species strategic plans as a template, LWRD drafted a Polk County Aquatic Invasive Species Strategic Plan as a starting point for citizen input.

Two planning meetings were held to develop a strategic plan to prioritize which actions should take place in Polk County in response to aquatic invasive species. The agenda for the first meeting—held on May 20th, 2015—included a review of AIS issues, a summary of the draft Polk County Aquatic Invasive Species Strategic Plan, and an opportunity to review and provide feedback on the goals, objectives, and actions of the plan. A second meeting—held on June 17th, 2015—provided a review of changes made in response to the May meeting and also provided an opportunity for additional changes to be made to the plan. The meeting dates coincided with the dates, times, and places of Polk County Association of Lakes and Rivers (PCALR) meetings, with the second meeting taking place directly preceding the 2015 Annual Meeting of the organization.

The meetings were publicized in the Polk County Leader, through press releases submitted to all Polk County papers, through the Polk County Association of Lakes and Rivers email list, and through direct emails to stakeholders. Once the plan was finalized, it was opened to a 30 day public comment period ending on Friday, July 31st, 2015. Notice of taking public comment was posted in the Polk County Government Center, the Polk County Justice Center, the Village of Balsam Lake Municipal Building, and as a two week ad in the Polk County Leader. The plan was approved by the Polk County Conservation, Development, Recreation, and Education Committee on Tuesday, September 2nd, 2015; by the Polk County Board of Supervisors on September 15th, 2015; and by the Wisconsin Department of Natural Resources on October 5th, 2015.

While creating this plan, citizens determined that progress on the plan should be reviewed and updated on an annual basis. Likely, this review will take place in conjunction with PCALR meetings.

The majority of the goals of the plan will be funded with grant assistance through the WDNR Aquatic Invasive Species Education, Prevention, and Planning Grant program (Goal 1, Goal 2, Goal 3, Goal 4, and Goal 5, Objective 3). Early Detection & Response and Maintenance & Containment Grants will be being applied for on an as needed basis.

POLK COUNTY AQUATIC INVASIVE SPECIES IMPLEMENTATION PLAN

Partner Group Acronyms

LWRD: Polk County Land and Water Resources Department
SCRA: St. Croix River Association
RA: River Alliance
NPS: National Park Service
MPCA: Minnesota Pollution Control Agency
WDNR: Wisconsin Department of Natural Resources
MDNR: Minnesota Department of Natural Resources
UWM: University of Wisconsin-Madison
PCALR: Polk County Association of Lakes and Rivers
LRO: Polk County Lake and River Organizations
SD: Polk County Sherriff's Department

Goal 1. Prevent the introduction, establishment, and spread of AIS in Polk County waterbodies			
Objective	**Action**	**Partners**	**Timeline**
Objective 1. Increase compliance with local and state prevention laws and ordinances	**Action 1.** Organize and conduct Clean Boats, Clean Waters trainings	LWRD, WDNR, SCRA	Yearly, ongoing
	Action 2: Assist set up and maintenance of statewide prevention programs: Clean Boats, Clean Waters, Landing Blitz, Bait Dealer Initiative, and Drain Campaign	LWRD, WDNR, SCRA	Yearly, ongoing
	Action 3. Support local efforts to install electronic monitoring and information devices, such as ILIDS cameras and motion-activated recorded messages at public boat landings to monitor and educate about AIS.	LWRD, LRO	As interest arises
	Action 4. Partner with local law enforcement to provide augmented enforcement of AIS laws and ordinances	LWRD, SD	Yearly, ongoing
	Action 5. Increase presence of WDNR Water Guard	LWRD, WDNR, SCRA	Yearly, ongoing
	Action 6. Determine the feasibility of watercraft washing sites, especially along the county border	LWRD, LRO, SCRA	As interest arises
	Action 7. Create an inventory of public boat landing AIS signs and install signs when necessary	LWRD, LRO	Yearly, ongoing
	Action 8. Consider developing infestation indication signs to alert users that AIS are present in specific waterbodies	LWRD, LRO, PCALR	As interest arises

Goal 2. Control populations of aquatic invasive species			
Objective	**Action**	**Partners**	**Timeline**
Objective 1. Respond to existing AIS populations	**Action 1.** Support individual waterbody group actions to accomplish control efforts	LWRD, PCALR, LRO	Yearly, ongoing
	Action 2. Prioritize control efforts on tributaries and chains of lakes with existing populations of AIS and waters with a high risk of spread	LWRD, WDNR	Yearly, ongoing
Objective 2. Respond to new and pioneer AIS populations	**Action 1.** Respond to new AIS populations using best practices, including the WDNR Rapid Response Framework	LWRD, WDNR, LRO	As need arises
	Action 2. Conduct initial monitoring in response to new infestations, including bed mapping and aquatic plant point intercept surveys	LWRD	As need arises
	Action 3. Eradicate new and pioneer AIS populations, if possible	LWRD, LRO, WDNR	As need arises
Objective 3. Support citizen efforts to control and eradicate AIS	**Action 1.** Implement the statewide purple loosestrife biocontrol project, involving citizens whenever possible	LWRD, LRO	Yearly, ongoing
	Action 2: Provide training and equipment to citizens for giant and Japanese knotweed control	LWRD, LRO	Yearly, ongoing
	Action 3. Determine seed viability of knotweed stands	LWRD, UWM	As need arises

Goal 3. Monitor Polk County waterbodies for AIS and document results			
Objective	**Action**	**Partners**	**Timeline**
Objective 1. Encourage and support efforts to monitor for aquatic invasive species	**Action 1.** Organize and conduct Citizen Lake Monitoring Network AIS Workshops	LWRD, SCRA, WDNR	Yearly, ongoing
	Action 2. Organize and conduct Project RED Workshops	LWRD, NPS, SCRA, RA	Yearly, ongoing
	Action 3. Organize and conduct the AIS Bridge Snapshot Day Training	LWRD, SCRA, RA	Yearly, ongoing
	Action 4. Promote opportunities for engagement on websites (Polk County, PCALR, WDNR, Wisconsin Lakes, SCRA)	LWRD, PCALR, WDNR, LRO, SCRA	Yearly, ongoing
Objective 2. Complete statewide monitoring priorities	**Action 1.** Implement statewide monitoring protocols on Polk County lakes, rivers, and streams	LWRD, WDNR	As need arises
	Action 2. Adapt the Early Detection Smart Prevention Protocol to monitor the St. Croix River, an AIS Source Water	LWRD, NPS, WDNR, WDNR, MPCA	Biyearly, ongoing
Objective 3. Respond to local monitoring needs	**Action 1.** Monitor for Eurasian water milfoil near where this species occurs: the Upper Apple River, Beaver Brook, Trade River, and Wolf Creek Watersheds	LWRD, LRO	Biyearly, ongoing
	Action 2. Monitor for zebra mussels near where this species already occurs: the Horse Creek Watershed	LWRD, LRO	Biyearly, ongoing
	Action 3. Respond to any new AIS reaching Polk County by monitoring nearby waterbodies	LWRD, LRO	As need arises
Objective 4. Document monitoring results	**Action 1.** Ensure citizens are knowledgeable in using the WDNR statewide database, SWIMS	LWRD, LRO, PCALR	Yearly, ongoing
	Action 2. Voucher undocumented specimens according to WDNR procedures	LWRD	As need arises
	Action 3. Alert stakeholders if a new AIS is found by the best means available (WDNR, local lake organization, etc.), including following the WDNR Rapid Response Framework	LWRD, WDNR, LRO, PCALR, SCRA	As need arises
	Action 4. Explore the need for a Polk County AIS database	LWRD, PCALR	Ongoing

Goal 4. Provide AIS information and education in Polk County and surrounding areas			
Objective	**Action**	**Partners**	**Timeline**
Objective 1. Conduct a mass media campaign to inform residents and visitors about AIS	**Action 1.** Distribute press releases, information, and articles to local papers/radios, PCALR, and county lake organizations	LWRD, PCALR	Yearly, ongoing
	Action 2. Distribute AIS brochures at local businesses, bait stores, and public spaces	LWRD, PCALR, LRO	Yearly, ongoing
	Action 3. Work with partner groups to develop a high quality, eye catching, portable AIS traveling display that can be checked out by local groups	LWRD, PCALR, SCRA	As need arises
	Action 4. Install a billboard with AIS messaging on major travel routes into Polk County	LWRD, LRO, PCALR	As interest arises
	Action 5. Consider the inclusion of AIS information in the Polk County Tourism Guide and other county publications and mailings	LWRD, PCALR	Yearly, ongoing
	Action 6. Provide up-to-date AIS information on the Polk County website	LWRD	Yearly, ongoing
	Action 7. Use social media such as Facebook, PCALR email and news list serves, and websites to expand messaging	LWRD, PCALR	Yearly, ongoing
	Action 8. Explore additional ways to expand messaging and highlight efforts such as geo-fencing (ads that pop up based on proximity to an infested waterbody, Washington County, MN)	LWRD, PCALR	Yearly, ongoing
	Action 9. Provide AIS information as a featured guest on local radio programs	LWRD	Yearly, ongoing
Objective 2. Undertake a targeted AIS educational effort to reach specific audiences	**Action 1.** Present an AIS display at county events (County Fair, local festivals, fishing tournaments, local radio stations, etc.)	LWRD, LRO, PCALR, SCRA	Yearly, ongoing
	Action 2. Provide education to Polk County schools, libraries, civic groups, camps, bait stores, etc.	LWRD, PCALR, LRO, SCRA	Yearly, ongoing
	Action 3. Provide lake organizations with an AIS display for meetings and/or attend lake organization annual meetings as a presenter	LWRD	Yearly, ongoing
	Action 4. Provide trainings to assist volunteers in identifying aquatic invasive species and their native look-alikes	LWRD, SCRA, NPS, WDNR, PCALR	Yearly, ongoing
	Action 5. Explore opportunities for providing education for fishing tournaments, focusing on when tournaments are registered	LWRD, LRO, WDNR, SCRA	Yearly, ongoing

Objective 3. Provide AIS education at Polk County boat landings	**Action 1.** Install AIS signs at public boat landings	LWRD, LRO	Yearly, ongoing
	Action 2. Support local efforts to install or update kiosks with AIS information	LWRD, LRO	As interest arises
	Action 3. Assist local efforts to create, print, and distribute individualized waterproof lake maps with AIS information	LWRD, PCALR, LRO	As interest arises
	Action 4. Support statewide programs with educational components: Clean Boats, Clean Waters, the Landing Blitz, and the Drain Campaign	LWRD, LRO, WDNR, SCRA	Yearly, ongoing

Goal 5. Sustain the implementation of the plan			
Objective	**Action**	**Partners**	**Timeline**
Objective 1. Continue to seek funding for a Polk County AIS program	**Action 1.** Apply for WDNR AIS Education, Prevention, and Planning Grants to continue a county program	LWRD	Biyearly, ongoing
	Action 2. Apply for WDNR AIS Early Detection and Response and Maintenance and Containment Grants	LWRD, LRO	As need arises
	Action 3. Leverage current partner efforts to strengthen grant applications	LWRD, SCRA, NPS, PCALR, LRO	Yearly, ongoing
	Action 4. Identify additional funding sources and partners to expand opportunities for action	LWRD, SCRA, NPS, PCALR, LRO	Yearly, ongoing
Objective 2. Support funding for local AIS programs	**Action 1.** Provide grant reminders and information to local organizations	LWRD, PCALR	Yearly, ongoing
	Action 2. Support local AIS Control Grant applications	LWRD, PCALR	As need arises
	Action 3. Provide template Rapid Response Plans on the PCALR website to assist Control Grant applications	LWRD, PCALR	Yearly, ongoing
Objective 3. Increase communication and collaboration with partners	**Action 1.** Consider the formation of an AIS Steering Committee, either at the county, watershed, or regional level, including Minnesota	LWRD, WDNR, MDNR, PCALR, NPS, SCRA	Yearly, ongoing
	Action 2. Create an annual report to document AIS initiatives, including maps showing the presence and absence of aquatic invasive species	LWRD	Yearly, ongoing
	Action 3. Support lake and river organizations in exploring all ways they could help prevent and control the spread of AIS, including forming a Lake District	LWRD, WDNR	Yearly, ongoing
	Action 4. Form a communication network to convey pertinent AIS information (success stories, new AIS locations, etc.) across county and state lines	LWRD, PCALR,	Yearly, ongoing
Objective 4. Support objectives of related AIS plans	**Action 1.** Support the goals of related AIS Strategic Plans including the St. Croix River Watershed and WDNR plans	LWRD	Yearly, ongoing
	Action 2. Support the goals of Polk County Aquatic Plant Management Plans	LWRD	Yearly, ongoing