

October 2023, Phragmites Working Group Lake Bernard Annual Season End Report – Year six

Organizing and Participating: Year six

With more volunteers than previous years, and the help of a student from the Federation of Anglers and Hunters Invading Species Program, the Phragmites Working Group Lake Bernard (PWGLB) completed season six of invasive phragmites australis removal from the shore and water of Lake Bernard. We were able to manage almost all previously identified stands and provide demonstration events at 10 sites in other areas of Almaguin. This was our group's busiest season. Dry land events started in June, and in - water work went from July 15 until the end of September. Our last event was dry- land removal October 22. See Appendix A starting on Page 20 for charted data.

2023 Volunteer Cutting events (target 20 minimum) as of October 2023.

For planning purposes, an event is defined as a minimum of 4 hours in length and a group of 8-10 volunteers using recommended equipment and removal strategies, with transportation of the biomass provided by either the Village of Sundridge or Township of Strong.

- 135 different volunteers participated in cutting events in 2023 (77 in 2019, 87 in 2020, 103 in 2021, 110 in 2022), of the 135:
- The 135 included 34 Youth volunteers and 7 High School volunteer hours forms were signed.
- 19 properties were cleared that were municipal, business, church, or charity.
- 9 new sites were managed.
- 67 cutting events** (26 in 2021, 31 in 2022) for **47 Phrag sites** and **2 Japanese knotweed sites** were held (33 in 2021, and 39 sites 2022). On some dates more than one site was managed. Some sites took more than one event to manage. In addition, small wetland sites were managed in July, and Strong Township. New ones were found for next season.
- 978.25 Phrag fighter hours as of October 2023.** This includes the Japanese knotweed sites that were managed for the first time this season, and demonstration sites in other Almaguin locations.
- 74 saw operator hours were paid for and, 3 saw operator hours were donated.
- 2 days were contracted from the Invasive Phragmites Control Centre (IPPC), for a three-person team and one Truxor to cut on the West End of the lake, and application of herbicide by backpack sprayer on five sites as follows: two west end stands, the ditches at the dam, one property zoned industrial and one small stand on municipal property.) <https://www.phragcontrol.com/>
- Biomass removed: (one half ton truck is 1.5 cubic metres in size). There were approximately 83.25 cubic metres of cut phragmites and 12 cubic metres of cut Japanese knotweed taken to the landfill by works or roads department crew. Other bagged or tied phrag was transported by volunteers.
- 9 sites required more than one cut. Several sites would have benefited from more than one, but we were unable to schedule another this season.
- 17 individual sites have had removal over four seasons. Sites in rock, gravel, or pit-run will be very difficult to permanently remove with mechanical removal therefore herbicide would be more effective there. Several sites in the village that have been managed for 5 or 6 seasons were smaller and done more quickly.
- Invasive phragmites was removed on 8 sites in 2018, 13 in 2019, 27 in 2020, 33 in 2021, 39 in 2022, and **47 sites in 2023.**
- 101 shoreline property owners on an email list of 198 received email information regarding weekly removal events.

- 6 municipal leaders received information and gave support.
- 5 Lake Bernard Property Owner Association directors attended events to support us this season.
- 7 local businesses provided business services (T-shirts, purchased services, food, equipment, signage etc.).

We continue to see decreases in the size of stands, smaller stalks, less density, and less regrowth, with the best results in deep water, allowing us to occasionally work on up to three small sites in one morning.

Some sites like the environmentally complex dam and the large west end stands will need more than one method of management, including the application of herbicide by licenced applicators. The cost, years of time and human effort required to manage these large areas with saws, shovels and cane cutters alone is unsustainable. We continue to consult with the Invasive Phragmites Control Centre team led by Dr. Gilbert regarding best practices for management for these sites.

10 demonstration sites were provided outside our immediate area. Other Almaguin regional groups consulted with us this season to assist with their removal efforts: Magnetawan Quarry, Evergreen Heights Public School, Canadore College Indigenous STEAM program, Premier Road North Bay Beach front owners, Round Lake Association, Ahmic Lake, Kawawaymog Lake, and Magnetawan River sites. We will continue to assist with development of removal groups across Almaguin.

This is the best management practices (BMP) document which outlines all methods currently used effectively in Ontario: https://www.ontarioinvasiveplants.ca/wp-content/uploads/2021/05/OIPC_BMP_Phragmites_April302021_D10_WEB.pdf

Since the BMP was published, a new herbicide has been approved for use in wetlands in Ontario: <https://www.better-vegetation-management.basf.ca/en/products/habitat-aqua.html>.

Partnerships:

We are thankful for the support, advertising, provision of administrative time, and hands on assistance from: our lead agency the Near North Enviro- Education Centre (NNEEC) <https://www.nneec.ca/> the Lake Bernard Property Owners Association (LBPOA, <https://lakebernard.ca/> our municipal leaders, the respective works, and roads departments from the Village of Sundridge <https://www.sundridge.ca/en/index.aspx> , Strong <https://www.strongtownship.com/en/index.aspx> and Joly Township. <https://www.townshipofjoly.com/> We acknowledge the significant contribution of our 5 arborists, and many who donated items to help us such as: Phoenix <https://phoenixbuilding.ca/> for tarps, others for three-hole bricks to secure the boom, leaf litter bags, twine and rakes. Thank you to homeowners for snacks. Thank you to our excellent photographer Steve Kyzar, and as well to Carena Alexis for the excellent drone shots. Special thanks to Scott Hubbard of Scotty's Lake Tours for spreading the Clean Drain Dry message. Thank you to Bill Black, from Black Motor Sales for maintaining our saws. Thank you to Brooke Schryer and the Ontario Federation of Anglers and Hunters, Invading Species program. <https://www.invadingspecies.com/> Thank you to current and past phragmites fighters –as You are Truly Making A Difference.

Funding:

Recognition with our thanks needs to be given to the partners (NNEEC, LBPOA, and Strong Township) who submitted the applications for grants received from:

- **The Toronto Dominion Friends of the Environment grant:** \$8,000.00 through NNEEC

- **Green Shovels Collaborative, Federation of Ontario Cottage Association, and Invasive Species Program grant:** \$4,000.00 through LBPOA
- **The Invasive Species Action Fund micro grant:** \$2,000.00 through Township of Strong
- **The Invasive Phragmites Control Fund– Invasive Species Centre:** \$9,000.00 through NNEEC
- **Invasive Species Summer Technician Position** – through Township of Strong, funded by the Ontario Federation of Anglers and Hunters (OFAH) Invading Species Program.

Donations were received throughout the summer. Booking and commitment for payment of the 2 Truxor event days by the Invasive Phragmites Control Centre (IPCC) occurred in the spring based on the fundraising done and underway.

Purchased services:

- 19 cutting events required saw operators. Two skilled arborists Todd Cruz “Wolverine” and John Paul Bressan “Arborist Alliance” ran the Stihl Kombi saws on Fridays. Three additional arborists Paul McDonald, Wesley Woodruff, Bob Merrick were occasional operators as was saw operator Darryl Judd. Another volunteer ran a saw on three occasions.
- Cutting in water required that the saws be assessed, greased, and maintained after each cut, as recommended by Dr. Gilbert and the supplier.
- The Invasive Phragmites Control Centre (IPCC) team of 3 was hired for two days July 24th. and 25th, 2023, and rain forced them to stay another half day to complete the scheduled work.

Scheduling:

- Regular Tuesday and Friday morning cutting days were scheduled. Sites requiring saw operators were mostly scheduled on Fridays. A volunteer ran a saw on three occasions. An electric saw was piloted.
- Volunteers were asked to email if they planned to attend. Cuts started at 7:30 am with set up of the boom, signs, tarps, and tools. Saws started early and volunteers arrived after 8:00, we aimed to finish at noon. Pizza lunches were provided for the two large Truxor days. Volunteers brought their own water. Small snacks (butter tarts) and cans of carbonated flavored water were provided.

Volunteers

Volunteers are the force behind this work, and they assist with planning, evaluation, and motivation to get the Phrag gone! Phragmites continues to be a significant environmental threat to our lake and Almaguin watersheds, but by report and observation we are making a huge difference.

Meetings: Thank you to the committee members: Meetings of the Executive were held as per the terms of reference for the working group.

There are 8 currently on the Executive of the Phragmites Working Group Lake Bernard.

Jocelyn Palm – Founder and Director of the Near North Enviro-Education Centre (NNEEC)

Lois Brisbois – Founding member Phragmites Working Group/lake property owner

Dan Burton – Naturalist, member Muskoka Conservancy

Marilee Koenderink – Chair, lake property owner

Dave McGirr – Lake property owner/supporter

Bob Attwell –Director NNEEC, lake property owner

Robert Renaud – LBPOA

Karin Mertins – Vice chair, Lake Bernard supporter/naturalist

Abby Flynn – Trent University Co-op Student for 16 weeks funded through OFAH.

Receiving Minutes:

- Justine Leveque – Mayor Village of Sundridge
- Tim Bryson – Mayor Township of Strong
- Brian McCabe – Mayor of Joly Township
- Marianne Stickland – Councillor Strong Township, supporter
- Jennifer Boyce – Lake property owner, supporter
- Kathy Pike – Founding member of the Phragmites Working Group Lake Bernard /lake property owner
- Jeremy St. Onge- Canadore College School of Environmental Studies, Technician and Technology program
- Vicki Whitmell – Director NNEEC
- Jane Smith – Lake property owner
- Jeff Browne - President LBPOA

Zoom meetings held:

1. **April 13, 2023**, 7:00 pm – 8:30, 8 participants
2. **May 18, 2023**, 7:00 pm – 8:15, 10 plus 1 guest participating.
3. **June 15, 2023**, 7:00 pm- 8:00, 9 participants
4. **July 20, 2023**, 7:00 pm – 8:00, 6 participants
5. **Aug 17, 2023**, 7:00 pm -8:00, 7 participants
6. **September 21, 2023**, 7:00 – 8:30, 6 participants
7. **October 19, 2023**, 7:00 – 8:30, 7 participants

What is needed now?

We continue to follow the recommendations for management of the phragmites on Lake Bernard from the report received in October 2019.

https://www.nneec.ca/files/ugd/1acc58_8c667559849c4337bbc41232be0373be.pdf.

The recommendations were for three areas:

1. The dam,
2. The west end and
3. The smaller stands scattered along the shoreline in and around the lake.

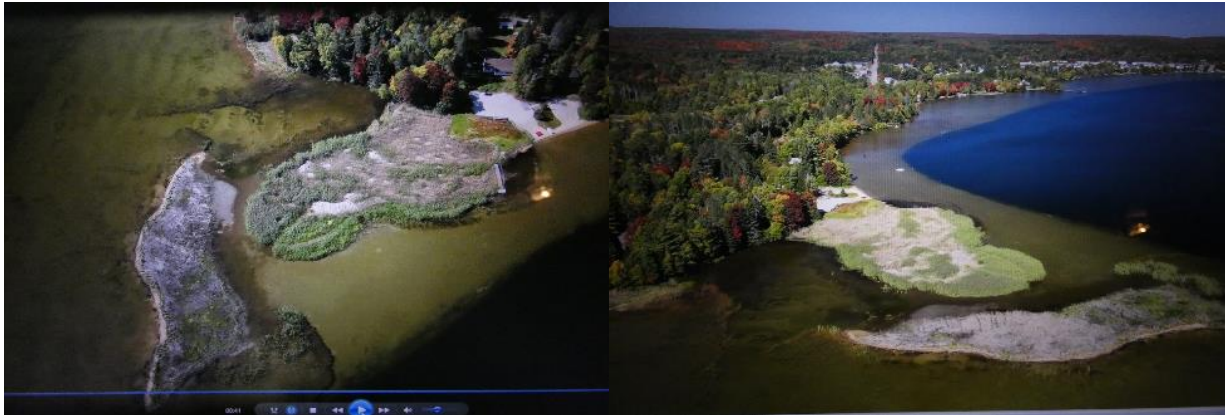
Consultation with Dr. Janice Gilbert from the Invasive Phragmites Control Centre (IPCC)

<https://www.phragcontrol.com/> occurs in the fall and in May via pictures and emails.

Repeated cane cutting and spading for stands in water too shallow to immediately drown, and on shorelines will be needed (more than once per season if possible). The other sites we will manage with saws if needed, as well as cane cutters and spades.

Application of Herbicide: The dam and the west end stands will be assessed in the spring of 2024 to see if spraying is needed to achieve a return to a native marsh and reed bed area. The 0.9-acre lakeside portion of the west end stands separated from the shore stand by a small channel (considered crown land and belonging to MNRF) has been reduced significantly. The 1.3-acre shore stand will need a second application and the current dead phragmites will need to be removed by volunteers during the winter of 2024. Returning the reed bed to native aquatic plants is now an achievable goal for this lake.

See below drone shots of west end stands from September 2023 showing successfully killed areas, and green areas to be managed in 2024.



Strategies are always stand- specific and success depends on:

- the shore bottom composition,
- size of the stand, age (how high and how long established),
- depth of water (If the phragmites is growing in 0.6 metres of water, is cut at the shore bottom, and kept underwater for 6 weeks, a high proportion will drown. Murky water blocks the sunlight best from reaching the roots).

Factors considered:

- location of the phragmites (dry land, shore, or deep water),
- the nature of the shoreline (sand or soft soil for spading versus rocky substrate which makes it difficult to spade rhizomes below the ground)
- weather – drought, flooding, or changing lake water levels, and
- climate heating (longer ice off periods, warm weather and longer phragmites growing seasons).
It is a plant – we can tarp it, spade it, cut it, drown it, thoughtfully apply herbicide, and we can make it gone.

How long will this take, how many stands are there, and can they be cut?

Our goal for Almaguin continues to be: “Phrag Free by 2033”. It will take this long to effectively remove all the phragmites on large stands. Ongoing monitoring for regrowth and immediate management action for any regrowth will be needed. The number of small stands on the lakeshore is unknown. Property owners are removing it and need to remove it promptly and frequently from their property. There are properties on the lake where owners do not remove phragmites from their property. All sites need to be managed.

Our Municipal partners assist and support this and could declare invasive phragmites australis a noxious weed, leading to more owners removing it or asking for assistance.

Businesses: There is no one locally to hire to clear phragmites from property, we need to have a team for hire.

CN, MTO, Private and Municipal Property: A coordinated watershed approach is needed to ensure the roads, CN tracks, private and municipal properties and especially wetlands are all managed according to best practices. Phragmites does not stop along lot lines and spreads easily from roads to private property and wetlands.

Residents: Please convince property owners to:

- allow assistance with removal, and
- maintain removal each season and
- begin removing using best practices if they have not done so.

See below the report from summer student Abby Flynn regarding some of the season's activities.



Summary of Invasive Species Activities in Almaguin Highlands
Abby Flynn | Ontario Federation of Anglers & Hunters | 16 Weeks

Summary of Activities

Over the summer, I participated in many activities with the Phragmites Working Group Lake Bernard (PWGLB). Each day consisted of a different activity. I have been involved with 30 Phragmites australis cuts, 2 Garlic mustard pulls, and 8 Japanese knotweed management events. I have done over 15 public outreach events and reported over 90 invasive species reports on EDDmapS.

I have gained valuable experience from the 16 weeks I have spent with the PWGLB. I have learned how to identify invasive species and how to use EDDmapS. I have also learned the steps required to delegate to local councils and improved my public speaking. I have been involved in monitoring the entire Almaguin Highlands region for invasive species, consisting of about 10 townships.

Training Received

Water Steward Training

Attended the "water steward training" hosted by OFAH in Haliburton. Here, I learned background knowledge of aquatic invasive species (AIS), as well as how to approach boaters, educate them on "Clean Drain Dry" and conduct a voluntary AIS check on their boat/watercraft.

EDDmapS 101 & 102

I watched two pre-recorded webinars by “The Bugwood Center”. EDDmapS 101 & 102 educated me on how to use EDDmapS to its full potential and ensure that I am reporting effectively.

HIT squad training (OFAH)

I attended a two-day training session hosted by OFAH’s Invasive Species Awareness Program. Here, I learned about terrestrial and aquatic invasive species, how to effectively communicate about invasive species and the best ways to make posts, Green Shovels Collaborative, Invasive species reporting tools, and what the MNRF does for invasive species.



PAMF

I and other members of the PWGLB attended a training session hosted by the Phragmites Adaptive Management Framework. Here, we learned about the PAMF program, what they do, and how to enroll and submit a management site for review.

Aquatic Permitting for the Control and Removal of Invasive Phragmites

On July 6th, members of the PWGLB attended a webinar about applying for aquatic permits for herbicide use to control Invasive Phragmites. This taught me the steps required to apply for and receive a permit granting use for aquatic herbicides.

An Introduction to Phragmites Best Management Practices (VIRTUAL WORKSHOP)

July 13th. Here, I attended a webinar about the best management practices for Invasive Phragmites management. I learned the best methods for Phragmites management and some background information on applying for permits. I talked to other Phragmites management groups all over Ontario.

Education & Outreach

Displays

Over the course of 16 weeks, I was involved in several educational outreaches. We informed the public by doing educational displays at local hotspots.

Sundridge Foodland

Here, I spent a full day with a table set up outside of the local grocery store. I approached people, informed them about invasive species and the work we are doing, and looked for volunteers. Here, we had significant conversations with 30 people and handed out over 100 webinar posters, contact cards, Grow Me Instead, and spading and cutting to drown Phragmites removal postcards.



South River Outdoor Show

Over the course of a weekend, we attended the

South River outdoor show and set up a booth. Here, I had 30 significant conversations with members of the public each day, informing them about invasive species, and what they can do to help. We distributed over 100 Clean Drain Dry postcards, webinar posters, contact cards, and Grow Me Instead.



Magnetawan Home Hardware

In Magnetawan, we did a morning display at the hardware store. Here, we talked to gardeners, boaters, ATV'ers, and construction workers about invasive species, and what they can do to ensure they are not causing the spread. I had 15 significant conversations and distributed over 40 handouts, including Grow Me Instead, Clean Drain Dry, and posters for the Webinars we had planned.

Sundridge Wharf Boat Launch Education

Myself, members of the PWGLB, two OFAH employees, and a local boat tour business owner set up a display event at the boat launch in Sundridge. Here, I spoke to boaters about Clean Drain Dry, informed members of the public about invasive species, and played "invasive species Jeopardy!" with a class from the local school. We talked to 20 community members that day and distributed about 40 handouts including Clean Drain Dry, Phragmites educational cards, Invasive species handouts, and Grow Me Instead. During this event, a local news reporter from the North Bay Nugget came and interviewed one of the OFAH employees about Clean Drain Dry, and myself about what the PWGLB is working on this season (Link: https://www.muskokaregion.com/news/almaguin-environmental-group-continues-work-to-stop-spread-of-invasive-species/article_5152fef5-d316-590f-9309-c4bed2744dc0.html)



Canada Day

On July 1st, we attended the Canada Day celebrations at Sundridge



Lion's Park. Here, we set up a display and showed people all about Japanese

knotweed and Phragmites. We handed out the quick reference guides, PWGLB cards, and CDD postcards. We had about 10 significant conversations with people at the festivities. We met with the MPP of the area, Graydon Smith, and informed him of our work for the season.

Magnetawan Locks

On July 7th, we did boat launch education at the Magnetawan Locks, we were there for 2 hours, had 10 significant conversations and distributed 20 handouts. We distributed Clean Drain Dry



postcards, Spading and Cutting to Drown postcards, Clean Drain Dry, and PWGLB cards.

Cheers to Summer

On July 9th, we did a display at Cheers to Summer. This is an event hosted by the Lake Bernard Property Owners Association. Here, we spoke to property owners, offered to help with Phragmites management, and collected emails for volunteers. Here, we had 15 significant conversations.



Strong Township Boat Launch Ed

On July 20th, I set up a display at the Strong Township boat launch on Lake Bernard. Here, I had 6 significant conversations with boaters about CDD and how they can do their part to protect our lakes. I handed out Clean Drain Dry postcards and the Invasive Species quick references guides.



Powassan Farmers Market

On July 29th, we travelled to Powassan and held a display at the Saturday morning Farmers Market. Here, we spent a lot of time educating locals about Phragmites, showed them what we are doing to manage them on Lake Bernard, and even helped out a municipality by offering them information on how to manage Phragmites.



Here we had 40 significant conversations and handed out over 60 educational materials. We handed out PWGLB cards, CDD postcards, Cutting to Drown and Spading postcards, and the invasive species quick reference guides.

Sundridge Sunflower Festival

On August 12th, we attended the Sundridge Sunflower Festival. Unfortunately, they had to cancel due to stormy weather. We attended for about 3 hours and had 7 Significant conversations before they shut it down.



School Education

Canadore College Indigenous STEAM

We collaborated with Canadore College's Indigenous STEAM program this year. On a Friday morning, I travelled to Canadore College and gave the students and the teacher (9 people) some basic information about Phragmites australis,

and what our group is doing to manage them. After that, we walked the campus and found 2 sites that had Phragmites present. I instructed the students on how to use EDDmapS to report the sites and then talked them through the next steps. Two weeks later, 3 members of the PWGLB travelled to a North Bay site on Premier Road to meet the students there and give them more information on invasive species, management, and mapping. While we were here, we met with the adjacent property homeowners and informed them about Phragmites management. By the end of the morning, they were planning their own North Bay Phragmites removal group. The event was such a success that we spoke to a news reporter for the North Bay Nugget on the topic, and a story has been printed. (Link: https://www.northbaynipissing.com/news/phrag-fighters-show-north-bay-residents-how-to-eradicate-invasive-plant-species/article_f89cdf3-917e-5609-ba4b-63f6a3b87d0b.html)

Evergreen Heights Public School

We also travelled to a local elementary school that had Phragmites on site. Here, we had a group of 15 students (grades 2, 3 & 4) and 2 supervisors. Members of the PWGLB (and myself) educated the students on Phragmites and other invasive species, species at risk, EDDmapS, and management practices. After the students were educated, we began the management of the site. We safely used cane cutters and had the students help us gather and bag the phragmites. In 3 hours, with 20 volunteers, we cleared the site and collected 15 leaf litter bags full of removed biomass.



Municipal Websites

Over the course of the summer, I have reached out to multiple municipalities encouraging them to update their websites with information on invasive species.

<https://www.armourtownship.ca/how-to-identify-manage-invasive-phragmites>

<https://townshipofperry.ca/phragmites-australis-in-the-township-of-perry/>

<https://www.mycallander.ca/en/living-here/communications-transportation#education>

<https://www.strongtownship.com/en/news/what-you-should-know-about-phragmites.aspx>

<https://www.townshipofjoly.com/en/links/local-organizations>

Another link featuring the PWGLB: <https://www.sootoday.com/local-news/garden-river-project-gets-funding-to-help-monitor-prevent-invasive-species-7333129>

Resource Handouts

Over the course of 16 weeks, I handed out a variety of information to many different spots in the area. I handed

Phragmites Working Group Lake Bernard

Phragmites are an aquatic reed plant that is invasive in Ontario and extremely harmful to our wetlands. Help us protect all of our native plants and creatures!

Think you have invasive Phragmites on your property? Interested in volunteering? Contact us at madison.kosanderink@gmail.com or go to www.rnsec.ca/phragmites

For more information on phragmites check out: <https://www.ontario.ca/plants/species/invasive-plants/species/phragmites/>

For more information on where to purchase a cane cutter for your phragmites management, Contact us.



July 5th and 12th
from 9:00 am - 12:00 pm

You Don't Know What You Got Til You Map it

Mapping Adventure Day

EDDmaps
find-map-track

Naturalist

Join us on **July 5th or 12th** from **9:00 am to 12:00 pm** for a day of celebrating biodiversity. We will be mapping invasives and other interesting things we find in the great outdoors!

To get started, download **EDDmaps** or **iNaturalist** from your app store, and make an account!

Weather permitting, this event will begin in the front yard of the Near North Enviro-Education Centre. We will be outside all morning! Dress Accordingly.

To Register: **Happy Hunting!**
<https://form.jotform.com/231516581170249>
Or use the QR code to get to the form

out 50 Grow Me Instead, 5 invasive species stickers, 100 Clean Drain Dry postcards, spading and cutting to drown postcards, contact cards, and awareness letters. These were delegated to garden centers, Outdoor Adventures ATV, Scotty's Boat Tours, McLaren Builders, Strong Township, Nicholson's Greenhouse, Sundridge Library, the Village of Sundridge, etc. I was also tasked with making multiple handouts for the PWGLB to use at displays for educational purposes.

Meet some of our Local Turtles
They are critical to a healthy ecosystem.



That's why the Phragmites Working Group Lake Bernard is working to protect them!
www.nneec.ca/turtle-conservation.ca

Boat Launch Education
July 17th, 2023
South Lake Bernard Beach Boat Launch

Come out and learn about invasive species and what you can do to slow the spread! The Ontario Federation of Anglers and Hunters Invading Species Awareness Program will be demonstrating how to practice Clean, Drain, Dry.

Clean Boats, Clean Lakes!

Aquatic Invasive Species are extremely harmful to lakes and water bodies—Stop the spread!



Calling All Nature Enthusiasts!

Volunteers Needed!

Be a part of a dedicated group of volunteer Phrag Fighters working to protect our local lake from invasive species and restore our ecosystems

Enjoy the beauty of our local lake while making a difference.

we sign volunteer hours for high school students

Tuesday and Friday Mornings from June- September
8:00 am- 12:00 pm
Locations vary

Email: Marilee.koenderink@gmail.com



For More Information, visit:
www.nneec.ca/phragmites

Awareness Letter

At the beginning of my 16 weeks, we noticed a large number of Japanese knotweed sites in Sundridge. To approach this issue. I wrote an awareness letter for Japanese knotweed. This consisted of; Background information on the PWGLB, information about Japanese knotweed and some helpful links, contact information, and a form to sign if residents wanted help to remove their Japanese knotweed.

May 2023
Phragmites Working Group
Lake Bernard Sundridge
Contact Name: Marilee.koenderink@gmail.com

Dear Sundridge/Strong/Jolly Resident:

As members of the community and concerned residents, we are writing to alert you about Japanese Knotweed. Japanese Knotweed is a woody plant that is an aggressive, invasive species that has established itself in and around our area. It may be on your property; if so, you will want it removed quickly. With your help and permission, we can show you what it is, and help you if you are not able to remove it yourself, beginning with digging. For more information, check out the following links:

<https://www.invasivespecies.com/invasers/plants/japanese-knotweed-2/>

https://www.invasivespeciescentre.ca/invasive-species/meet-the-species/invasive-plants/japanese-knotweed/?gclid=Cj0KCQj2au-0IBhCsAR8sAPz1FjONPvm-V5_uh3tBcbuBXEtzHdrtSvDoffTngQ3r1zUheXbottSTZMaAmMDEAlw_wcB

Please refer to the Ontario Invasive Plant Council's "Best Management Practices" for more information on the best practices on how to safely remove this plant from your property before it has become established. If you are unable to manage the plant by yourself, please contact us.

https://www.ontarioinvasiveplants.ca/wp-content/uploads/2016/06/OIPC_BMP_JapaneseKnotweed.pdf

The Phragmites Working Group Lake Bernard has been locating and removing stands of invasive Phragmites for over five seasons, and we have seen great success. We are attempting to locate and manage stands of Japanese Knotweed in the area. We believe it is located on more than 10 sites. This spring and summer, we are working to map the distribution of this invasive species to limit and track its spread. Once established, Japanese knotweed becomes much harder to remove, due to its vigorous root system, which can spread up to 10 meters from the parent stem and sprout through concrete and asphalt. Japanese knotweed spreads quickly, can reduce native biodiversity by outcompeting native species, and is an extremely persistent species. If it goes unchecked, it can cause damage to the soil on your property, damage the foundation of your home, and even lower the value of your property.

Here is what you can do:

- Educate yourself and your neighbours about Japanese Knotweed.
- Identify the plant if it lives on your property and let us know.
- If you are unable to do it yourself with help from family or friends, give us your permission to assess/map/cut/remove invasive Japanese Knotweed on your property according to best practices and proper disposal methods to prevent further spread.

We hope you will consider joining this effort to ensure the health of our natural communities and wildlife and maintain the property and recreational values for future generations! Please email back if you need help removing Japanese Knotweed from your property in 2023.

Sincerely,

Phragmites Working Group Lake Bernard

Marilee Koenderink chair

Marilee.koenderink@gmail.com

(705) 774-3878

I would like to know if I have Japanese Knotweed on my property and how to remove it and I understand that I can ask volunteers to assist me to dig up Japanese Knotweed from my property.

Name of property owner: _____

Signature of property owner: _____

Address of property: _____

Date: _____

Do you want to receive updates and information regarding this issue? If so, please provide your

email address: _____

Webinars

1. Turtles on the Move

On June 1st, I hosted a webinar for community members on turtle education. Here, I discussed the different turtle species, how to help a turtle cross the road, how to help a nesting turtle (in an unsafe location), and what to do with an injured turtle, and informed them about the efforts of the Ontario Turtle Conservation Center. We had about 15 people in attendance. On Saturday, June 24th, I was a part of getting an injured turtle transferred to the Ontario Turtle Conservation Center.

Phrag Fighters present...

TURTLES ON THE MOVE

Location	Near North Enviro-Education Centre or Zoom in at home!
Date	Thursday, June 1st @ 7:00pm


Here are some of the topics that we will cover

- Why are turtles so important?
- Types of turtles native to Ontario
- How to help a turtle cross the road
- Nest Protection-What to do
- Why are turtle species at risk?
- Snapping turtles-Not so scary!
- Invasive Phragmites and affects on turtles.
- Naturalist

Come and get a pair of gloves-On us!

Ontario Turtle Conservation Centre: (705) 743-9000

See more about our Phrag fighting initiatives <https://www.oncec.ca/phragmites>



2. Least Wanted Invasives in the Almaguin Highlands

Brook Schryer, of the OFAH, did a webinar on the least wanted invasives in the Almaguin Highlands. I handed out posters to prepare for this, encouraging people to register and attend this event. During the event, I was one of the people responsible for handling any questions that came into the chat. We had 27 people in attendance for this event.

3. Dr. Janice Gilbert

The PWGLB Invited Dr. Janice Gilbert to do a webinar on Phragmites management. I attended this webinar, which was specifically tailored for our group (PWGLB). Dr. Gilbert spoke about herbicides and answered any questions that community members may have had.

4. Almaguin Lakes and Watersheds

I attended the Almaguin Lakes and Watersheds Conference on June 10th, 2023. This was a group of about 30 people who come from different organizations, councils, and lakes in the Almaguin region. Here, we broke into groups and discussed our biggest issues, and how to approach them. It was very informative for me to attend.

Monitoring & Early Detection

Mapping

To monitor for invasive species, our main focus was mapping. We have a lot of invasive species in our area, but no sites were mapped on EDDmapS. To do this, we mapped all sites we previously knew about in Sundridge, Strong, and Joly, and uploaded those to EDDmapS. Then, we covered the highways so we could inform the MTO. We started on Highway 124, from Sundridge to Magnetawan, and mapped all of the Phragmites stands we saw. Another day, I mapped the 510 from Magnetawan to Burk's Falls, mapping all roadside stands. Then, I mapped Highway 11, from



Sundridge to Burk's Falls. I then mapped from Burks Falls to Katrine on HWY 11, and then back to Burks Falls on the old highway.

I also mapped a large stand of Japanese knotweed in Rye Township and monitored strong township back roads for Japanese knotweed, Invasive phragmites, and other invasive species.

In total, this was about 45 sites that got mapped, and a route of roughly 210 km.

Monitoring



In Strong, there are 2 major sites where we are monitoring the Phragmites. the 1st site, we call the West End Stand. Here, there are 2 large stands of Phragmites. Last year, the PWGLB hired professionals to spray one of the stands with herbicide. One of my responsibilities this season was to go check on that stand and monitor if there is any new growth.

The other site we monitored is the Lake Bernard Dam. There are

Phragmites on residential property, roadsides, CN property, and in the water travelling down Bernard Creek. This season, I uploaded this site to PAMF as a management site. I had to take measurements through 5 points of the stand to upload it. I measured the stem count, stem width, hydrology, spread, direction, and if there is any visible stress to the phragmites.



Growing Period Report

At the end of July, I completed the management reports for the growing season for each of the 3 sites the PWGLB monitors.

Assessments

One of the things that the PWGLB offers is assessments to community members who think they may have Phragmites on their property. Throughout the 8 weeks, I did assessments for 7 phragmites stands, and about 20 Japanese knotweed stands in the Almaguin region.

Lake Assessments

Pool Lake

On July 31st, members of the PWGLB enlisted the help of Scotty's Lake Tours to tour Pool Lake and monitor for invasive species. Pool Lake is Directly beside Lake Bernard, so it is at risk of invasion. We toured the edges looking for Invasive Phragmites and investigated another aquatic plant to ensure it was native. Thankfully, no Phragmites were found, and I identified the aquatic species as Little Floating Heart.

Eagle Lake

On August 16th, I travelled to Eagle Lake to help the Eagle Lake Conservation Association do an assessment of their shorelines. They have been managing Phragmites for 6 years but are new to Japanese Knotweed. We did identify Japanese Knotweed on the shoreline and mapped it on EDDmapS.

Management & Response

So far, I have taken part in 33 invasive species management events.

1. **Sundridge Children's Garden– June 13th, 2023**
 - 13 leaf litter bags (cutting and spading)
 - 4 volunteers
2. **Union Street Beach– June 20th**
 - 4 volunteers
 - 12 sheaves– cutting and spading (both Phragmites and Japanese Knotweed) 10 volunteers.



3. **Evergreen heights public school– May 30th, 2023**
 - 15 leaf litter bags
 - 20 volunteers

4. **Sundridge Guardian Shoreline– June 20th, 2023**
 - 6 Leaf litter bags
 - 6 volunteers

5. **June 23rd, 2023 Stan Darlings Insurance Office and 27th (2 events)**

- 2 truckloads of dry stalks
- 45 construction bags full of green shrubs– to solarize.
- tarping, cane cutting, and raking.
- Friday, June 23rd - 6 volunteers and 2 saw operators.
- Tuesday, June 27th- 8 volunteers



6. **June 28th, 2023– Magnetawan Quarry**
 - 2 saw operators, 6 volunteers.
 - Cutting, piling and tarping
 - 3 half ton truck loads

Here are the rest of the management events I took part in for the rest of the season:

Number	Location	Date	# Volunteers	Sheaves	Bags	Trucks
7	Boyes Private Road	June 30 th	8	20	3	3
8	Stan Darlings (3)	June 29 th	2	(Adjusting tarps)	/	/
9	Stan Darlings (4)	July 6 th	2	120	/	6
10	Sewage Pumping Station	July 4 th	12	7	3	½
11	14 Sunset Drive	July 7 th	12	/	11 LL bags 26 Gallon bags	2
12	23 Tamarack	July 7 th	12	20	2	2
13	Knox Presbyterian	July 11 th	6	18	1	1
14	67 High rock drive	July 14 th	6	/	/	2
15	Hubbert's Pond	July 17 th	5	/	/	½
16	Village of Sundridge Dock	July 18 th	7	/	/	1
17	Magnetawan Quarry (2)	July 19 th	6	/	/	3
18	678 South Lake Bernard	July 21 st	8	100+	4	4
19	67 High Rock Drive	July 26 th	26	/	/	4
20	89 High Rock Drive	July 26 th	26	/	/	1
21	99 High Rock Drive & 109 High Rock Drive	July 27 th	19	100+	26	3
22	36 Crescent Road	July 28 th	10	100+	1	3
23	139 High Rock Drive	Aug 1 st	8	75+	2	3
24	698 South Lake Bernard Road	Aug 4 th	6	75+	/	1
25	Strong Township Ditches	Aug 8 th	4	45+	/	1
26	733 High Rock Drive	Aug 9 th	2	9	1	½
27	364 Crescent Lane	Aug 11 th	10	75+	/	3
28	114 Elizabeth St	Aug 15 th	14	/	/	1
29	Stan Darlings and 14 Sunset Tarp Touch up day	Aug 16 th	5	/	16	1/2
30	Pharmacy Shoreline (2 nd cut)	Aug 16 th	2	/	3	/
31	United Church	Aug 22 nd	6	26	2	/
32	23 Tamarack (in water)	August 25 th	11	60+	2	/
33	Turtle Rock Lane	August 23 rd	5	27	1	/
34	1027 High Rock Drive	August 25 th	5	30+	2	/





Conclusion

My 16 weeks working with the Phragmites Working Group Lake Bernard as an Invasive Species Technician have given me some valuable experience that I will take forward with me on my journey in the Conservation Biology field. I have gained hands-on experience in many different areas that will all be useful to me. Working with this group has allowed me to spend my time working outdoors preserving my hometown area. All members of the PWGLB have been extremely pleasant to work with, and I have never had a job where I have been able to learn so much in such a short time. For future seasons, I recommend that the PWGLB keeps doing outreach events, searching for more volunteers, and just talking to people about this issue. Invasive species are an issue that isn't going to go away, and in such a small community, it can be easy to spread the word with something as simple as a conversation on the street. I would like to thank OFAH and the PWGLB for such an incredible experience!



**Phragmites Working Group
Lake Bernard**

*Our Mission To Map, Identify
& Manage Invasive Species*

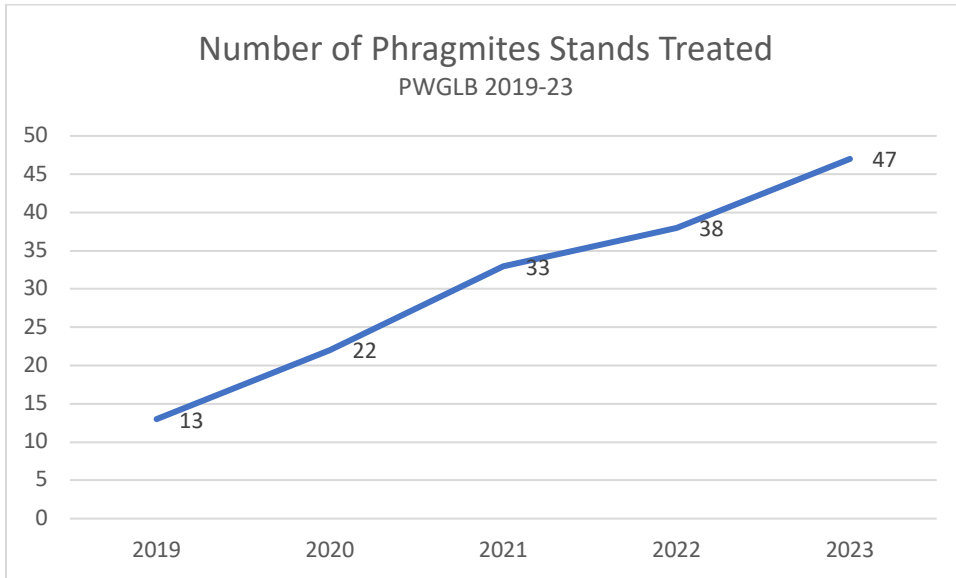
**Invading Species Reporting
1-800-563-7711**

 Giant Hogweed	 Garlic Mustard	 Purple Loosestrife
 Round Goby	 Spiny Flea	 Japanese Knotweed
 Rusty Crayfish	 Phragmites	

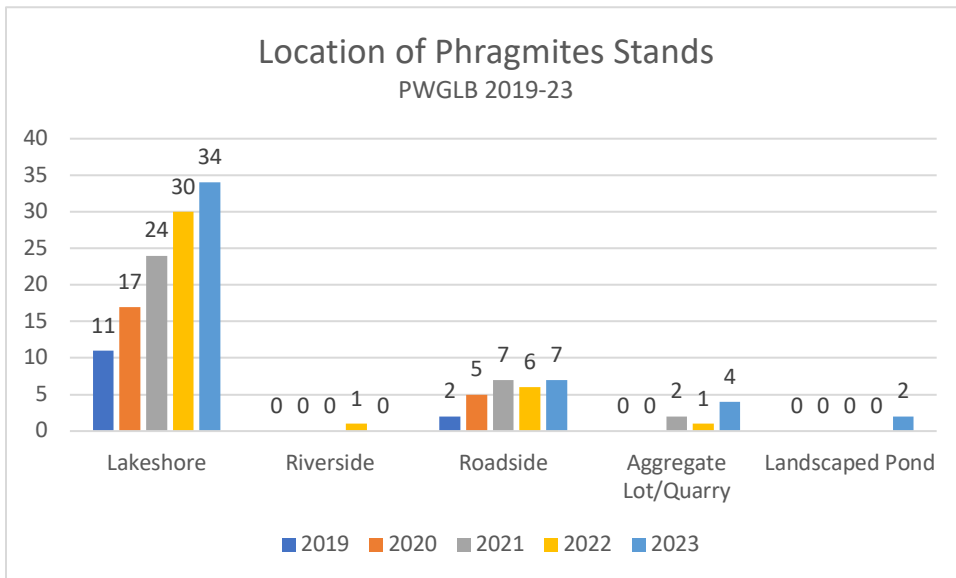
**For More Information
Please Visit**

 **Grow Me Instead PDF**
Information on Non-Invasive Plants For Your Garden

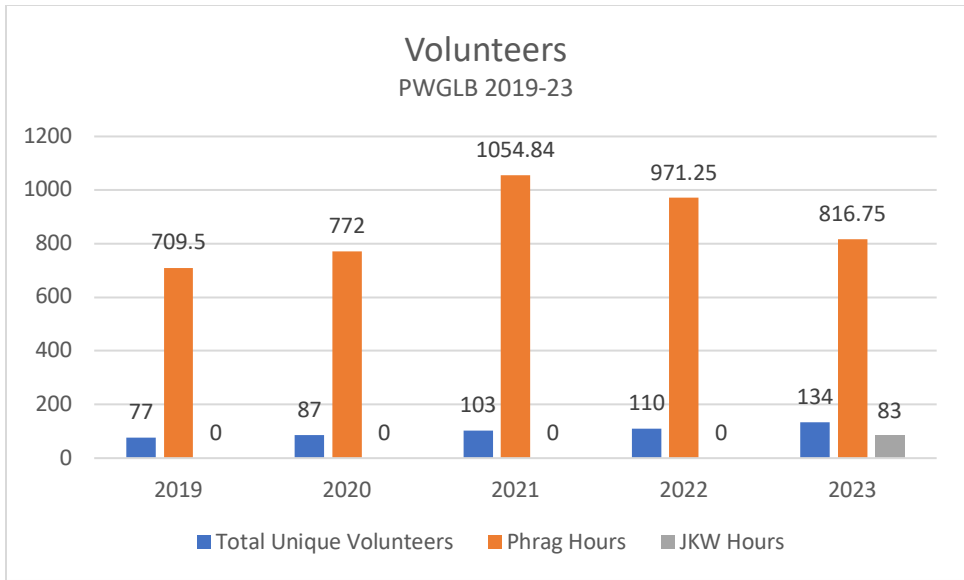
Appendix A



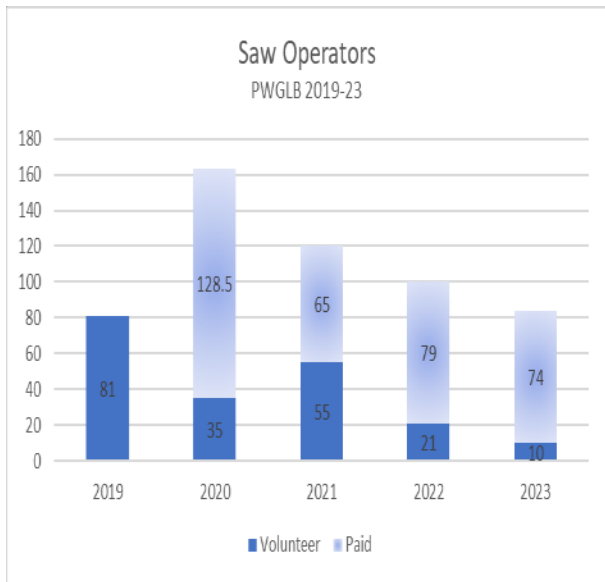
The 47 sites treated this year include 8 from the broader Almaguin area where consultation about invasive plant species was sought. Two Japanese knotweed only sites were not included in this tally.



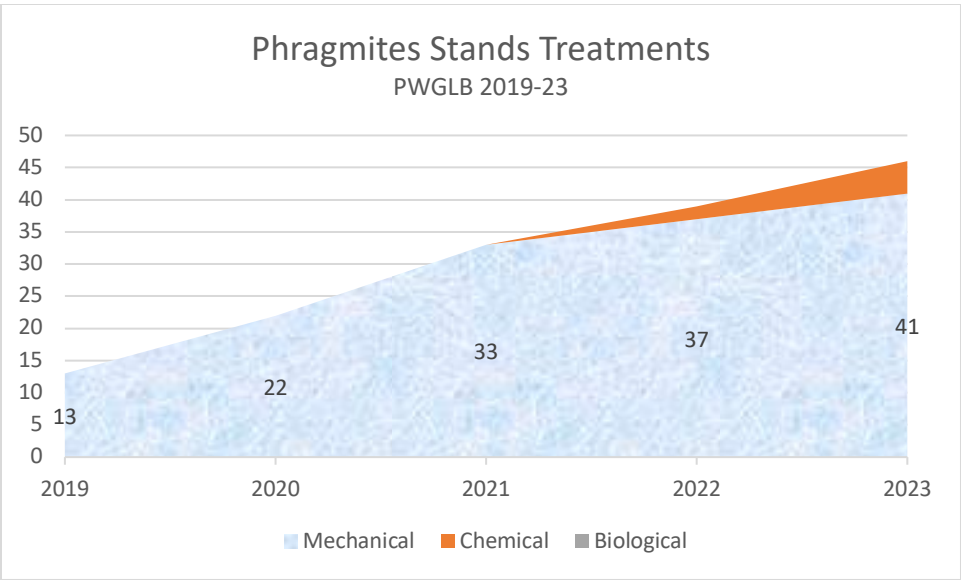
The focus of work continues to be along the shoreline of Lake Bernard. The roadside stands in Strong and Joly Townships as well as the landscaped ponds drawn to our attention this year, are important reminders that invasive species can infest any suitable habitat.



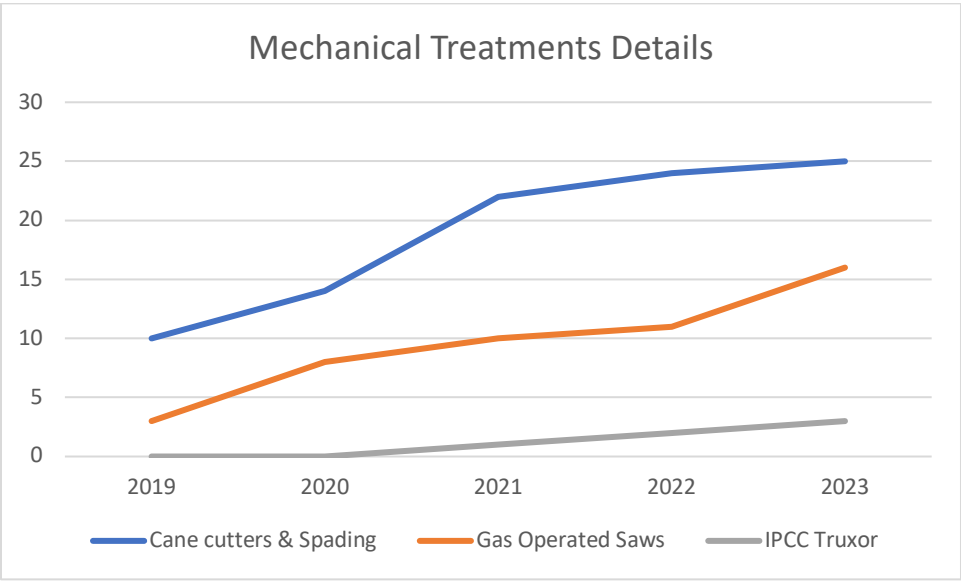
The number of unique volunteers continues to grow. While the majority of time is dedicated to the removal of phragmites, two Japanese knotweed only sites were also undertaken this year. The growth of this invasive is also a dense monoculture.



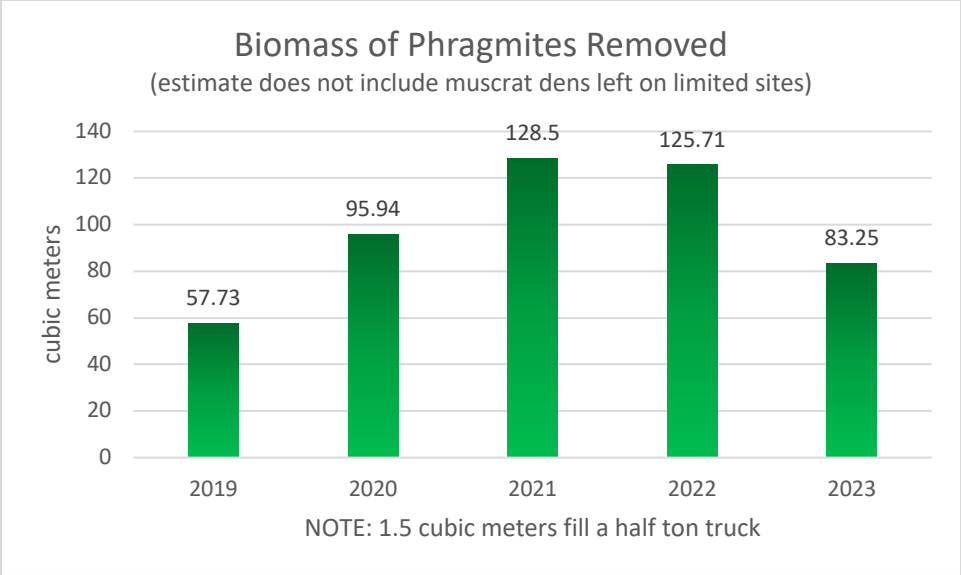
The general trend is towards fewer paid hours of professional sawyer time. This expertise is required where dense monocultures of established plants thrive, notably on the west and south ends of Lake Bernard.



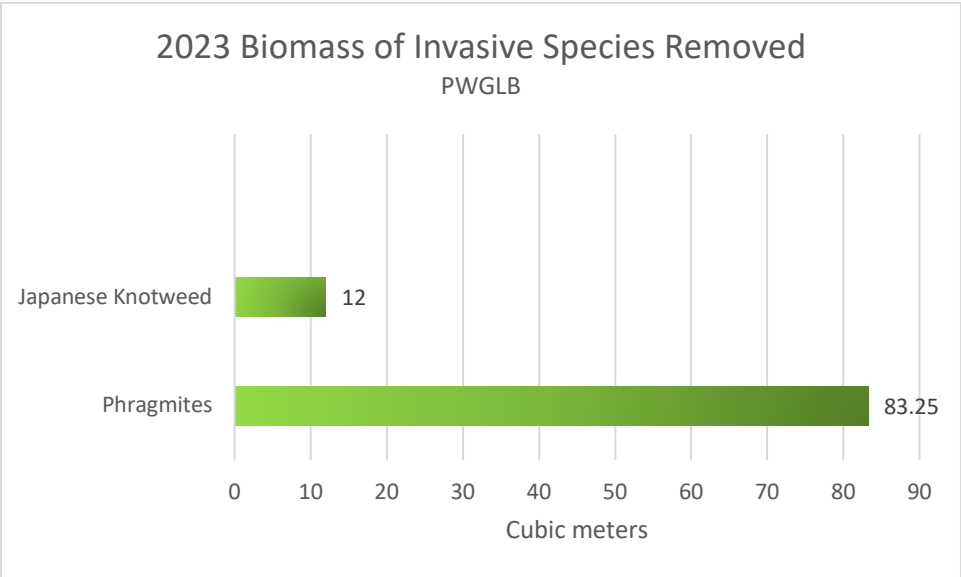
The majority of phragmites stands were treated using mechanical means like cane cutters, spades, saws and a Truxor from IPPC. This year 5 sites were sprayed using a herbicide on the advice of our scientific expert. Two of those sites had been treated chemically in the previous year with good results.



Most of the sites worked on over the years have been managed using cane cutters and spades only. There are however, some large and complex sites that have been treated with more than one method. These sites include the 2-acre West End Stand and the area around the dam on the west side of Lake Bernard.



The amount of biomass removed is an estimate that is calculated with the known volume of a leaf litter bag and half ton truck used by the municipalities to transport the material to the landfill. The decrease in volume this year at least, in part, reflects an effort to move away from counting leaf litter bags and sheaves because they can vary greatly in size to a more wholistic appraisal of how many truck loads of material had been gathered during a cut.



Even though there were only 2 Japanese Knotweed sites worked on this year, they generated an impressive volume of material before the sites were tarped to further stunt growth of this vigorous plant.