
THE CULLEN CURRENTS

Spring, 2024



Record ice-out dates for the Cullens

There's no doubt about it, this past winter set records for warm temps and early ice-outs. The Cullen Chain was part of this weather phenomenon.

Ice-out was March 12 for Lower Cullen and March 13 for Middle and Upper Cullen. These are the earliest ice-out dates on record for our association (though our records go back only 20 some years).

Typically, ice-out occurs in April or occasionally in May. The latest ice-outs that our association has recorded occurred during 2022, when Lower and Middle Cullen were ice-free on May 5 and Upper Cullen was ice free on April 29. The following year, 2023, ice-out was late too, with the lakes not opening until May 1-2.

This year's early ice-outs are related, of course, to the so-called "wimpy winter." The unprecedented warm spell included readings as high as 75 on March 3 in southern Minnesota.

For those who don't know, Charlie Boudrye keeps track of snow and rainfall totals for our association. He is a National Weather Service "weather spotter" and has been doing this since moving to Middle Cullen 24 years ago.

Boudrye is darn vigilant about collecting rain and snow totals. However, this year his official measuring stick and rain gauge pulled light duty. In November, just one inch of snow fell at his home. Snowfall in December was even less, measuring a mere 0.8 inches (but 2.13 inches of rain fell!). January brought 5.1 inches of snow, but February was a piker, measuring 0.1 inches. March saw a late month snowfall of 10 inches, making the total winter snow amount only 17 inches.

You can find ice-on, ice-out and rain and snow total information on our website under the lakes heading.

article by C.B. Bylander

DNR encourages you to be loon aware

The Minnesota Department of Natural Resources has published a new brochure titled "Be Loon Aware," which is largely a shout-out to boaters to please be respectful and observant. Things the DNR wants you to know include:

*Nesting loons get antsy when boats get within 500 feet of them. Often, they temporarily leave the nest. This means the eggs are unprotected and easy picking for hungry predators. Even if the eggs are not eaten, nest departures can interfere with incubation and result in nest failure. Since loons only have one or two chicks per year, every egg matters.

*Chicks are darn vulnerable until they are strong enough to fledge and fly south in October and November. This is due, in part, to the fact young chicks can't dive very quickly or deep. They are too buoyant. So, a watercraft disturbance that separates a chick from its parent can be a bad deal, especially if a bald eagle has a bead on the situation. A young loon's inability to dive quickly and deep is also quite the quandary when it sees a fast-approaching boat.



*Loons like to use the open areas of the lake that you like too for tubing, water-skiing or pleasure boating. They prefer open water so they are less vulnerable to shoreline-based predators. So, be vigilant while boating. Give loons their space.

Make it a bear-wise spring

from bearwise.org

If the bears in your area aren't up and about yet, they will be soon. Why wait until a bear is checking out your bird feeder, pet food or garbage? A few hours of prevention can help keep bears out in the wild and away from homes and neighborhoods.

Let's talk trash.

Litter patrol: Empty bottles, can, and bags still smell like food. Picking up all that stuff that mysteriously appeared over the winter will remove attractants and give you a chance to look over your property and remember what's on your spring to-do list.

Time for a bath: Anything that holds garbage emits smells that can attract bears. Give all your containers a good bath and spray the insides with a disinfectant or ammonia. Don't use lemon-scented trash can liners or tape fruity air fresheners inside the lid; they smell like the real thing to a bear.

Lock it or lose it: An overflowing trash container makes it easy for a bear to score lots of calories for very little work. In early spring, most bears are still losing weight and working hard to find food, so the all-you-can-scrounge buffet is even more appealing. Bears are very smart; if they find a big reward and nothing bad happens, they'll be back for more.



Bear-wise spring cleaning check list:

Patios and decks

Did you have winter cookouts or gather around the fire pit to roast hot dogs and marshmallows? Bits of food left on the grates or in the ashes are still appealing to a bear. After you clean up any scraps and trash, give your BBQ grill a good spring cleaning. Check under decks and porches and make sure there's nothing stashed down there you've forgotten about.

Pet and bird food

Pet food is full of calories and smells like dinner. Feed pets inside if possible. If you must feed pets outside, deep-clean the area, feed in single portions and remove food and bowls after each feeding. Store pet food where bears can't see, smell or reach it (on or under your deck or inside your screened-in porch doesn't count).

If you fed birds over the winter, stop putting out birdseed or other treats at the first sign that bears are active again. If migrating birds really depend on you, switch to hull-less birdseed and bring feeders inside every night.

Garages and sheds

Are you storing stuff in your garage and sheds that could attract a bear? Secure or move pet food, birdseed, canned foods and beverages and anything else that looks interesting or smells good. If you stored your summer gear, empty and clean out back packs and bike bags. There's probably at least one energy bar or scented lip balm buried in there.

Cars and trucks

Bears can be attracted by something as innocuous as an empty candy bar wrapper or soda can. Bears can easily peel down a window that cracked open or let themselves in to most unlocked vehicles, but they have a tough time letting themselves out. If you park vehicles outside, give them a good spring cleaning. Add a litter bag or small removable wastebasket and it will be a lot easier to keep vehicles clean and attractant-free. If you use air fresheners, odorless or pine-scented ones are the safest bet.

2024 Curly leaf pondweed (CLP) treatment

CLA applied for but did not receive any of the DNR AIS grant funding available this year. Fortunately, our members continue to be very generous in their CLP donations and we have built up AIS reserve funds that will more than cover the costs of this year's CLP treatment program, assuming the DNR allows the treatment to take place. The determining factors are all weather-related, but so far this year things are looking positive for the treatment to be allowed.

We have contracted with Central Minnesota Aquatics to conduct the pre treatment surveys of CLP, submit the required paperwork and survey maps to the DNR, carry out the treatment of the DNR-approved areas of CLP, and then conduct post treatment surveys of the lakes to document treatment results and to identify CLP locations that may be considered for treatment in 2025.

The two surveys of each of the Cullen Lakes and the resulting maps and reports will cost \$7,500. The estimated cost of the actual treatments, based on last year's surveys, will be \$28,000 to \$29,000. However, we expect this cost to be much higher because this year's mild, almost snowless winter will likely result in a bumper crop of CLP.

CLA membership update

As of April 9, 2024 we have 226 paid members and associate members. Membership letters for 2024 were mailed in late November to allow for those wanting to use a donation for 2023 tax purposes to do so. A second dues notice was mailed in March to those who had not yet sent in their 2024 dues. This brought in dues and donations from several more people and checks continue to trickle in. However, there are still 42 past CLA members who have not sent in their dues yet. ***If your name is highlighted on this newsletter's mailing label, you hadn't yet paid your dues by April 9. Those who receive the newsletter electronically will receive an email notice of this.*** We hope this is merely an oversight on your part. People who have not paid their dues by July 1 will be changed to non-member status.

If you haven't already sent in your \$25 membership dues (and hopefully a contribution towards the treatment of curly leaf pondweed), please take the time now to write your check, make any necessary corrections to your personal data on the membership letter you received, and mail them both to CLA, P.O. Box 466, Nisswa, MN 56468.

Curly-leaf pondweed (CLP) management donations update

The CLA Board of Directors would like to thank all who have contributed thus far to the 2024 CLP treatment fund.

Here are some of the statistics as of **April 9**:

*177 property owners and family members have made a CLP donation. There are 226 paid CLA members so far this year, so that's 78%.

*84 contributions were the \$250 suggested in the membership mailing. This does not include the co-owned properties whose owners split the donation among themselves. (We don't expect co-owners to each contribute the suggested amount.)

*27 contributions were more than the suggested \$250.

*Contributions have ranged from \$10 to \$975.

*Contributions total \$38,060.

THANK YOU!



Fourth of July boat parades

Each of the three Cullens will have its annual Fourth of July boat parade informally organized by its lakeshore property owners.

Participants are asked to gather at the east end of their lake on July 4 shortly before 2:00 p.m.

Plan on making one entire trip around the lake so on-shore observers can view all parade participants.

For safety reasons, please avoid excessive speed and do not weave in and out of the line-up of boats.

Send photos you take of your parade to the newsletter editor to be included in the summer newsletter.

Septic system-friendly water conservation

If your lake cabin/home has a septic system, it is especially important to use water saving techniques that will help it function efficiently. Every time water is used it enters the septic tank. An equal amount of water leaves the tank and heads for the drain field. Large amounts of water entering the system in short periods of time can cause problems because it can force unsettled solids along with the liquids into your drainfield. Here are a few tips to follow.

Conserve water in the kitchen

*Wait until you have a full load in the dishwasher before running it.

*Keep a pitcher of water in the refrigerator so you don't have to run water to get it cold.

*Don't allow water to run while you wash dishes by hand or clean vegetables and fruits.

*Repair leaky faucets promptly.

Conserve water in the laundry room

*Wait until you have a full load of laundry before running the machine unless you have a newer type washer which senses the size of the load and adjusts the water usage accordingly.

*Spread wash loads throughout the week or weekend to reduce the impact on your septic system.

*Use a front-loading washer or water-saving features on a top-loading washer.

Conserve water in the bathroom

*Install low-flow toilets and showerheads.

*Take shorter showers.

*Don't run the water while brushing your teeth.

Wood smoke pollutes, but you can help by burning cleaner

DNR Minnesota Conservation Volunteer magazine,
March-April 2024,

In recent years, the growing popularity of backyard fire pits has meant more people than ever are enjoying the ambience of recreational fires. However, those fires, as alluring as they are, come with an environmental cost. Because 57% of the state's direct fine particle emissions are from wood burning, these small fires are collectively a significant and increasing contributor to air pollution. The aromatic scent of wood smoke carries with it a complex mix of fine particles that, because they're so small, can affect human health.

Sounds bad. What can be done? No one needs to stop having a good time around campfires, but they can use best practices when they do burn. What does that mean? For starters, burn only dry, seasoned wood that's been stored out of the elements. Also, use a metal fire ring or one of the new types of "low smoke" fire pit devices that contain and concentrate the heat, and don't oversize your fire.

The more you learn to burn clean, the better off our air quality will be — for you, for your neighbors, and for everyone who lives downwind.

Nisswa recycling and garbage drop off center is closing



Residents and visitors will soon need to use other recycling and garbage services in the lakes area, since the site behind the Nisswa fire station will soon no longer exist.

Options include the Ideal Transfer Station off County Highway 16, the Crow Wing County recycling center at

the county landfill east of Brainerd on State Highway 210, or the free recycling services that an area waste disposal company, such as Waste Partners (the company used by the Nisswa recycling and center), provides for its customers.

PWC safety on the Cullens

In addition to requirements relating to all Minnesota watercraft, there are additional regulations pertaining to Personal Water Craft (PWC) under Minnesota Statute 86B.313.

Some of the pertinent highlights from this statute regarding PWC are as follows:

- 1) Each person on board is required to wear a personal flotation device (USCG approved).
- 2) No PWC operation is allowed between one hour before sunset and 9:30 A.M.
- 3) No PWC operation at a speed greater than a slow wake is allowed within 150 feet of:
 - a) a shoreline
 - b) a dock
 - c) a swimmer
 - d) a raft used for swimming or diving
 - e) a moored, anchored or non-motorized watercraft
- 4) While using a PWC to tow a person on water skis, a kneeboard, an inflatable craft, or any other device is not allowed unless an observer is on board or the PWC is equipped with factory installed or factory-specified accessory mirrors that give the operator a wide field of vision to the rear.
- 5) A PWC may not be used to harass or chase wildlife.
- 6) A PWC must travel through emergent or floating vegetation at no greater than a slow-no wake speed.

There are several other requirements under this statute pertaining to use of a PWC regarding prudence, lanyards, and operator permits. These can be found online at Minnesota Statute 86B.313.

Save the date! *CLA Annual Meeting* *Saturday morning, August 10*

8:30 registration, exhibits, coffee and rolls
9:00 business meeting followed by program

The morning's special program has not yet been decided. If you have any suggestions for a program topic, please share them with any Board member.

Lake Learning

The Aquatic Food Web: Who's Eating Whom?

by Moriya Rufer, RMB Environmental Laboratories

Those of you who fish probably already know a lot about the aquatic food web without realizing it. The aquatic food web is a conceptual way to look at who is eating whom and what in a lake. The reason biologists use the term "food web" now instead of "food chain" is because it is a better way to visualize that everything is interrelated in a lake.

Let's start at the bottom and build up from there. The first "ingredients" needed are nutrients (mainly phosphorus and nitrogen) and light. Algae and plants need nutrients and light to grow. Algae and plants are at the bottom of the food web and are important for the survival of everything else living in the lake. They are important as food and shelter and they also produce oxygen as a byproduct of photosynthesis, which fish and other aquatic organisms need to breathe underwater.

The next step includes the zooplankton and aquatic insects. Zooplankton are tiny little animals (mainly crustaceans) that eat algae. Some aquatic insects also eat algae, while some are predators and eat other insects or zooplankton. This group of organisms is very numerous in a healthy ecosystem.

Now we come to the planktivorous fish, the fish that eat zooplankton and aquatic insects. These fish are also called foragers, and include sunfish, crappies, and perch.

Here is where the food web starts getting complicated and interrelated, because when predatory fish are young and small, they can feed on zooplankton and aquatic insects, and when they are adults, they will feed on minnows and fish.

Bass are sort of in the middle of these steps on the food web, because they eat large invertebrates such as crayfish and mayfly nymphs, but also eat minnows and small fish.

At the top of the food web are the piscivorous fish, or the predatory fish that eat other fish. This is where most of the game fish are included. Muskies and northern pike are the top predators, while walleyes are part of this group too. This group can also include animals that live outside of the lake but eat fish such as eagles, ospreys, mink and fishers.

Finally, bringing the food web back around to the bottom again are the decomposers, or the bottom feeding fish and aquatic invertebrates such as crayfish, leeches and midge larvae. These organisms recycle all the dead material back into nutrients to feed the plants and algae.

The food web must stay in balance for a lake ecosystem to be healthy. Each part of the food web keeps the other parts in check. If you remove one part of the web, the rest of it will fall apart.

For example, if the food web is top-heavy, meaning it has too many northern pike and walleye, they will eat up all the small fish until they run out of food and die or get growth-stunted. Then, with no small fish around to eat the zooplankton and invertebrates, they multiply and run out of food, and so on down the line.

Next time you go fishing or are sitting gazing out at the lake, think about all the things that go into a healthy food web that contains healthy organisms. It's quite an amazing balancing act!

Enjoy the lakes!

