
Lake Koronis, Stearns County Grant Summary Report

Christine Hokkala-Kuhns
Regional Watercraft Inspection Supervisor
Minnesota Department of Natural Resources
Dec 28, 2017

Introduction

The watercraft inspection program’s goal is to reduce the spread of aquatic invasive species into and around the state. To accomplish this we conduct watercraft inspections and decontaminations at public water accesses throughout the state, work with citizen groups concerned about AIS, and educate the public.

In 2017 grant dollars were available for watercraft inspections by DNR staff. The grant offers a maximum of 375 hours per lake and a maximum total request of 750 hours. The Koronis Lake Association received a prevention grant for 336 hours for Lake Koronis in Stearns County. The contract dates were set from June 2, 2017 to Sept 4, 2017.

DNR inspectors were able to complete all the grant hours for the season. In addition to the grant, 180 tier hours were obligated to Koronis on the DNR Tier list and 18 hours were completed.

Inspection Process

The inspection process involves the watercraft inspector visually and tactilely searching for aquatic invasive species or anything else that could potentially spread aquatic invasive species such as water, mud, plants or other debris.

Watercraft inspectors also complete a survey while educating boaters about the issues surrounding aquatic invasive species. Survey questions focus on boater knowledge and behavior with information given on the impacts of aquatic invasive species and what can be done to prevent their spread.

Inspectors are trained to observe and document when watercraft enter a public water access with any violations, including boats with attached vegetation as well as watercraft whose drain plugs have not been removed. Information gathered by DNR and LGU authorized inspectors can help show potential risk of transporting AIS.

Results

Total DNR Inspections by Month

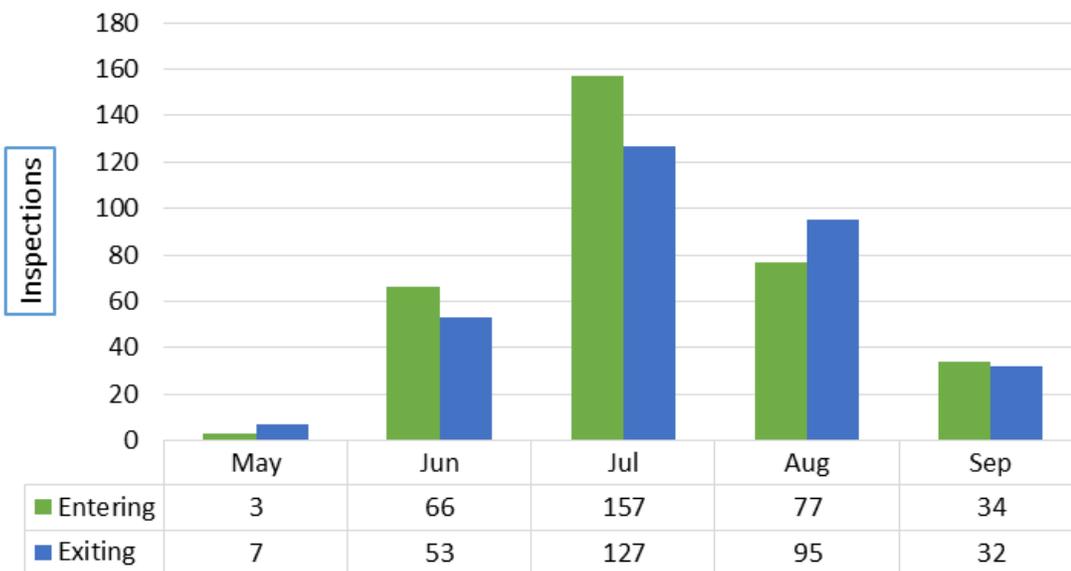


Table 1:
Through the 2017 season, DNR inspectors completed 651 total inspections.

Access and Drive Time During the Grant

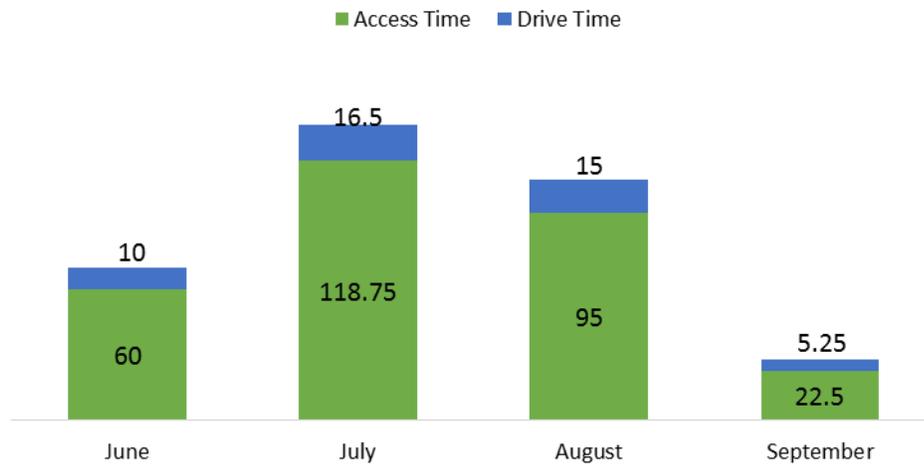


Table 2: Represents the total inspection hours completed per month along with the time the inspectors spent driving to and from the accesses during the grant period.

Breakdown of Inspections:

Total Entering/Exiting Inspections

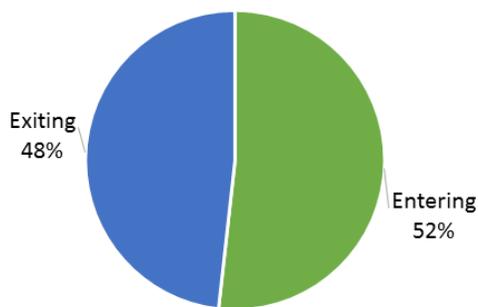


Figure 1: This pie graph shows the split between entering and exiting watercraft. Across the state a 40/60 split is typical.

In 2017 it is great to see the percentage of watercraft being inspected on the way in and leaving the access are nearly the same.

Entering and Exiting Watercraft by States Other than MN:

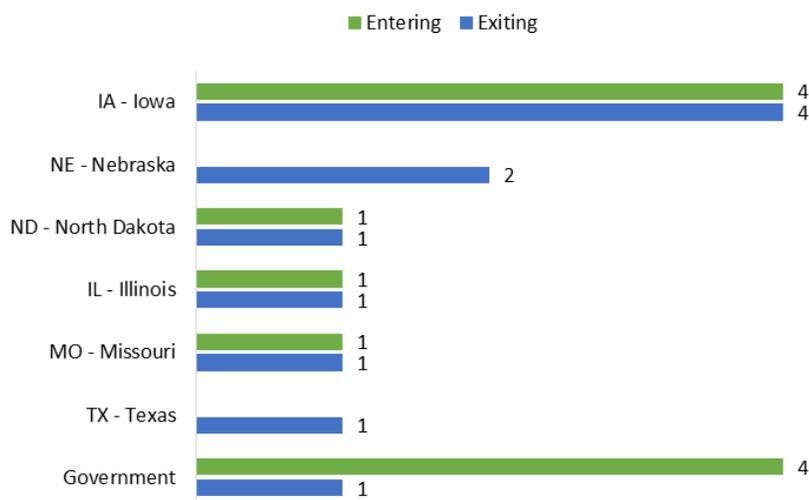


Table 3: During entering and exiting inspections, the state of the tow vehicle from the license plate was recorded in the survey.

Minnesotans entering and exiting the lake make up 96.62% of the total watercraft inspections for the season.

Watercraft from other state makes up 3.38% of the total inspections.

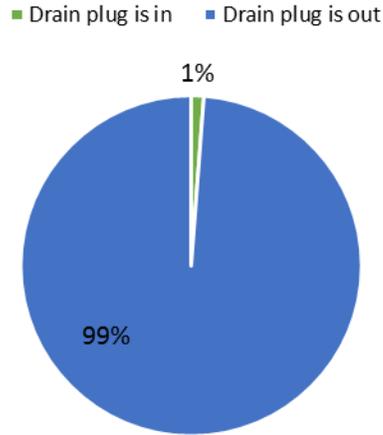
Compliance with AIS Drain Plug Law:

Figure 2: DNR inspectors visually check watercraft for compliance with the drain plug law. According to survey data, there is a 99% compliance rate with the law.

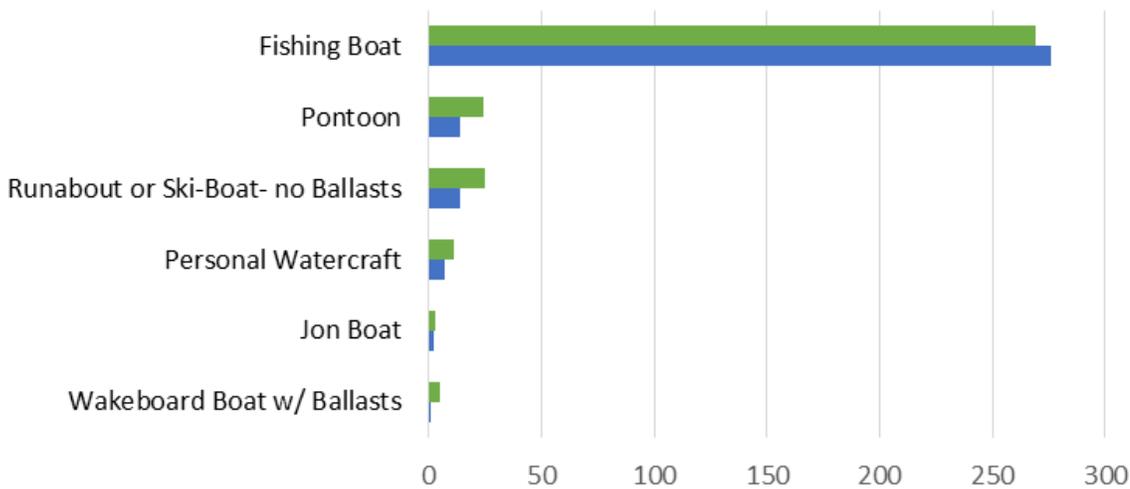
Of the 1% of watercraft with the plug in on arrival (4 boaters) to the access, only 1 had the plug in upon further questioning. Water was found in the watercraft but survey data did not show the boater was sent away for draining. The watercrafts had been out of the water for 5 days or more and had last visited Koronis.

Inspectors that observe plug violations direct users to remove the drain plugs to ensure no residual water is found and educate users on the law.

Drain Plug Compliance



Types of Watercraft Inspected:



	Wakeboard Boat w/ Ballasts	Jon Boat	Personal Watercraft	Runabout or Ski-Boat- no Ballasts	Pontoon	Fishing Boat
■ Entering	5	3	11	25	24	269
■ Exiting	1	2	7	14	14	276

Tables 4: Inspectors monitor and record the type of watercraft entering and exiting during the inspection process. The following chart shows the breakdown of types of watercraft visiting Koronis.

The majority are fishing boats followed by pontoons and runabouts or ski boats that do not have ballast tanks.

Locations and Items Found During Inspection:

DNR inspectors also observed and recorded the location of any plants, invasive animals, water or mud found during the inspection process. Potential threats were remedied according to DNR protocols. (Removing by hand, providing authorization forms, DNR decontamination, and Lake Service Provider transport).

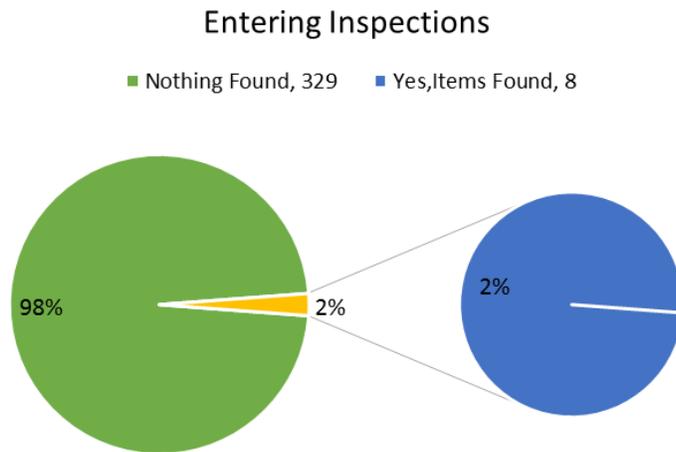


Figure 3: 329 watercraft arrived at the access cleaned and drained.

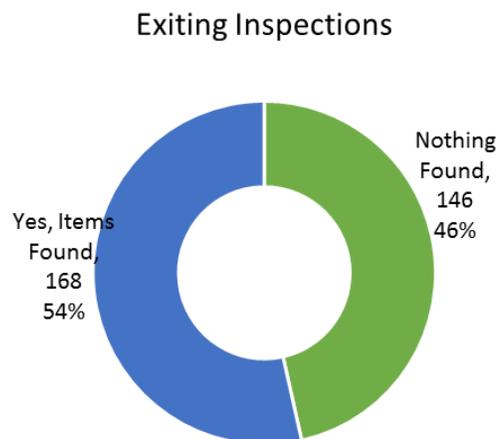
Plants, removed by hand, were found 7 times on incoming watercraft. One watercraft entering contained water.

No zebra mussels were found on the plants and no watercraft were sent away for a decontamination.

Figure 4: Lake Koronis is infested with Starry Stonewort, a non-native macroalgae. It is important to look at items found during exiting inspections since fragments and bulbils could casue another infestation if carried to another waterbody. According to DNR inspection data, plants were found 168 times on outgoing watercraft/trailers. More than 50% of the time plants were found on watercraft/trailers during an exiting inspection.

The plants were removed before the watercrafts left the access. This is not to say these plants were identified as Starry Stonewort, just vegetation that was removed before users left the access.

Inspectors also remind watercraft users that it is against the law to transport aquatic plants.

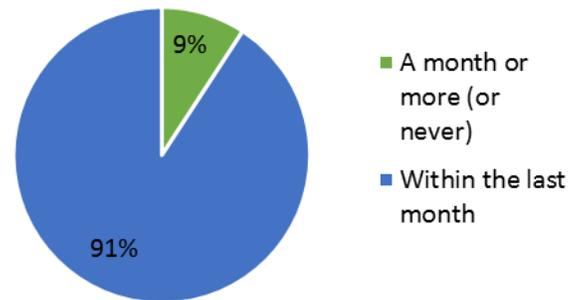


Incoming Inspections- Spoken with a Watercraft Inspector

Figure 5: Watercraft users are asked at each incoming inspection when they last spoke to a watercraft inspector. Within the last month, 91% percent of folks had spoken to a watercraft inspector at the access.

When staff encounter users that have not spoken to an inspector within a month or more, or never, it is an opportunity to educate users about AIS and AIS laws.

Spoken with an Inspector



How Long Has a Watercraft Been Out of the Water?

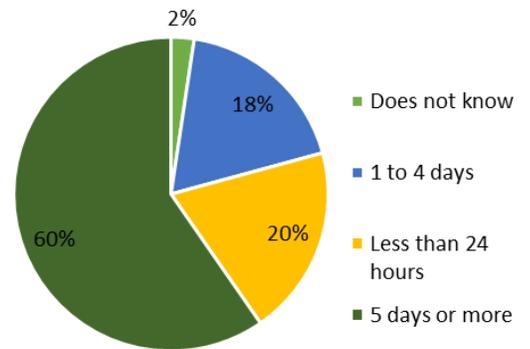
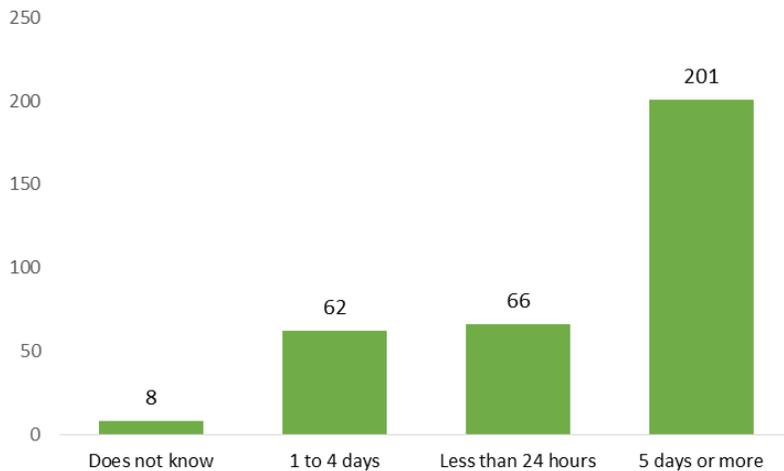


Table 5 and Figure 6: When asked how long a watercraft has been out of the water, the majority of watercraft had been out of the water for 5 days or more before coming to Lake Koronis.

Incoming Inspections-Previously Visited Waterbody

Watercraft users are asked during an incoming inspection which waterbody the watercraft had been at previously. This information can be helpful when determining risk of an incoming watercraft. According to the inspection data below in Tables 6, 37.69% of users coming to Koronis are return users. Users that said they did not know the last body of water used only comprised of 5.34% overall. Table 7 shows the next most previously visited lakes. Lakes with 2 or less responses were omitted from the graphs.

Top Last Lake Response

Table 6

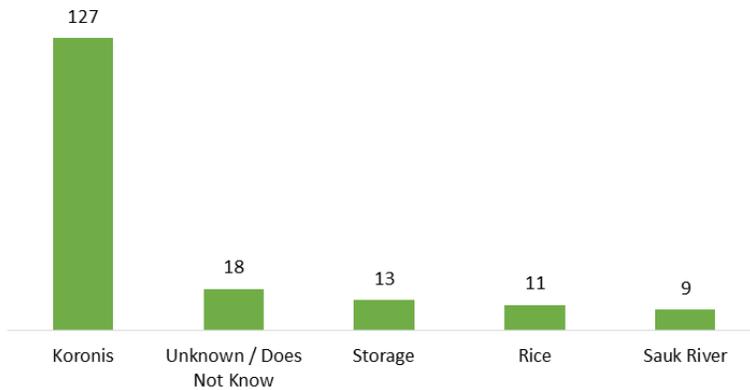
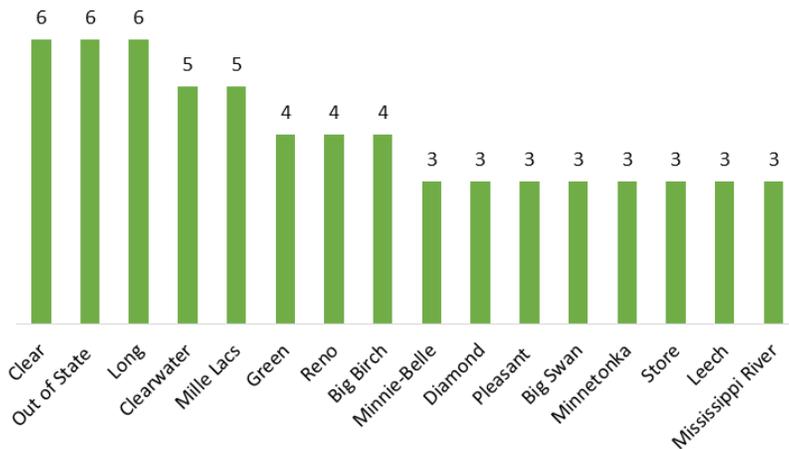


Table 7



Lakes with two responses or less: Ripley, Bemidji, School Section, Sylvia, Sugar, Weaver, Cedar Island, Pearl, Snail, Big Kandiyohi, Francis, Whitefish, Grand, Big, Osakis, Devils, Big Stone, Madison, Piersons, Games, Eden, Hanska, Washington, Hubert, Pulaski, Kabetogama, Sleepy Eye, Browns, Toad, Buffalo, Gull, Little Mud, Pine, Carnelian, Eagle, LSP - Lake Service Provider, Farm Island, Ann, Solomon, Maple, Gladstone, Maria, Wabedo, Medicine, Brown, Middle Spunk, Phalen, Beebe, Pierz, Miltona, Anna, Belle, Red, Minnewashta, Eagle's Nest, Big Marine, Sarah, Coon, Bald Eagle, Nest, French, Nokomis, Stahl's, North Lindstrom, George, Norway, Goodners, Orchard, Graham, Crow, Waconia, Oscar, Blackwater, Otter Tail Lake, Winnibigoshish, Detroit, Big Rice

When inspectors recorded the counties in which users had last visited, 52.23% of the users came from a waterbody within Stearns County. Unknown made up the 9.79%, with Meeker County third overall.

Summary

Incoming inspection data was reviewed for this report because of the inherent risks associated with incoming and outgoing watercraft. It is excellent to see that overall incoming violation rates are low at Koronis. DNR inspectors conducted 651 total watercraft inspections throughout the 2017 season. Inspectors spent a total of 46.75 hours driving to and from the access during the grant and 296.25 hours conducting inspections.