## MINUTES OF THE WORKSHOP

#### OF THE

#### **BOARD OF MANAGERS**

#### OF THE

## NINE MILE CREEK WATERSHED DISTRICT

## THURSDAY, FEBRUARY 2, 2023

## Call to Order of the Workshop

President Bob Cutshall called the Nine Mile Creek Watershed District Board of Managers workshop to order at 5:30 p.m. The meeting was held at the NMCWD office, Discovery Point, 12800 Gerard Drive, Eden Prairie, Minnesota.

Managers Present:

Grace Butler, Bob Cutshall, Erin Hunker, Peggy Kvam, and

Larry Olson

Advisors Present:

Janna Kieffer (Barr), Michael McKinney\* (Barr) and

Michael Welch\* (Smith Partners)

Staff Present:

Randy Anhorn (Administrator), Brett Eidem (Natural Resources Project and Planning Manager), Zach Stafslien

(Regulatory Program Manager), and Gael Zembal\*

(Education and Outreach Coordinator)

Others:

Ross Bintner\* (City of Edina) and Jordan Wein\* (WSB)

## Lake Cornelia Goldfish Population Management Study

Jordan Wein shared a PowerPoint presentation "Field Studies and Management of Invasive Goldfish in Lake Cornelia." He summarized the district's 2020 and 2021 field studies, reminding the group of the study's objectives:

- Attempt to estimate the population of goldfish using methods based upon common carp;
- Analyze recruitment history and identify nurseries;
- Study movement between and within water bodies; and,

<sup>\*</sup>Attended virtually

Test biomass reduction options.

Mr. Wein explained that the study used electrofishing and boat surveys, utilizing transects and the number of goldfish caught per hour to estimate the goldfish population and their biomass in Lake Cornelia. He explained the goal is to reduce fish biomass to 89 pounds per acre, which equates to a turning point at which these fish are not as detrimental to the lake's water quality, ecology, and habitat.

Mr. Wein reported that before NMCWD's box net removal of goldfish throughout the lake in 2021, the biomass in North Cornelia was at about 194 pounds per acre and in South Cornelia about 162 pounds per acre. The carp population in North Cornelia was approximately 8,300 and in South Cornelia was 5,900.

Mr. Wein described collecting data and doing lab analysis to determine the ages of the goldfish. He said the goldfish are spawning as evidenced by multiple ages of goldfish found in the lake. He said the population is successful at surviving young fish. He questioned how and where the population are spawning.

Mr. Wein said Lake Cornelia is a fishing-in-the-neighborhood lake, meaning the Department of Natural Resources fisheries manages the lake and stocks the lake occasionally, including stocking bluegill sunfish.

Mr. Wein said WSB studied fish movement patterns. Mr. Wein said staff monitored fish movement between North and South Cornelia, between Lake Nancy and North Cornelia, and between Swimming Pool Pond and North Cornelia. He said based on the monitoring, there does not appear to be a lot of movement between lakes. Mr. Wein pointed out the studies were done during low precipitation summers, which could have impacted the fish movement and study findings. He said fish movement was correlated with rainfall events. He described the identification of several likely spawning areas.

Mr. Wein said the study tested removal methods including a baited box net test in South Cornelia, which was pretty selective in catching goldfish and pretty successful. He reported staff did a post-removal goldfish population survey, replicating the pre-removal survey, and found the number of goldfish staff caught per hour dropped on both sides of the lake. He said based on this new data, staff estimates population in North Cornelia dropped from 8,300 to 7,100-7,200 and in South Cornelia dropped from 5,900 to about 4,800. Mr. Wein reported the estimated biomass in North Cornelia dropped from 194 pounds to 167 and in South Cornelia from 162 pounds to 129.

Mr. Wein summarized conclusions drawn from the goldfish management study:

- Strategies to estimate abundance were relatively accurate, and the district now has two years of catch per unit effort data for tracking purposes;
- Movement between water bodies is minimal, with the caveat that 2020 and 2021 were years with low water;
- The population has spring season movement into shoreline refugia;
- Recruitment appears inversely related to bluegill presence; and,
- Physical removal options work and are species-selective.

Mr. Wein presented WSB's recommendations to NMCWD:

- Reduce goldfish biomass to 60 pounds per acre or lower;
  - o Target natural aggregations in springtime using telemetry findings;
  - Scale up baited box net trapping with more traps throughout Lake Cornelia;
- Test aeration system in North Cornelia and compare dissolved oxygen profiles and bluegill abundance with South Cornelia;
- Investigate options for establishment of submerged aquatic vegetation and coarse woody debris habitat to improve water quality and promote panfish population;
- Investigate low-cost options for preventing goldfish from leaving Lake Nancy, and
- Education on goldfish management needs to continue and be expanded.

Manager Grace Butler said she would consider taking a large goldfish to a taxidermist because a stuffed goldfish would be a good education piece for the public about what their released pets grow into.

Mr. Anhorn noted that WSB's proposed 2023 scope of work is in the packet for the workshop. He said the proposal includes a more aggressive removal plan than NMCWD has undertaken in previous years.

President Bob Cutshall asked if there could be signage put in at Cornelia to educate people on the goldfish problem. Ms. Kieffer said that is a great idea. Mr. Anhorn said NMCWD can talk to Edina staff about signage and also about information in the city's newsletter and on its website.

Manager Butler moved, and Manager Hunker seconded, to authorize the administrator to enter into an agreement with WSB on advice of legal

counsel for the proposed goldfish management work for Lake Cornelia at an amount not to exceed \$37,811. On a vote, the motion was approved.

## I. Phase 3 of Flood-Risk Reduction and Resiliency Study Update

### a. Barr Engineering Co. Memo

Michael McKinney and Janna Kieffer updated the managers on their work to characterize flooding areas in the watershed to help further define NMCWD's role in flood-risk reduction planning. Ms. Kieffer said the objective of this task was to develop a methodology to delineate, define, and map regional flood areas, with the idea that NMCWD may seek to have a more engaged role in addressing flooding problems in the regional flood areas.

Ms. Kieffer pointed out the goals, objectives, policies, and actions in NMCWD's watershed management plan that pertain to addressing regional flooding problems.

 Mr. McKinney presented the draft map of regional and local flood areas through the watershed. Mr. McKinney highlighted key questions for the Board, including whether flood areas related to lakes should be considered regional flood areas, whether tailwaterimpacted flood areas should be considered regional flood areas, and if multi-jurisdictional flood areas should be considered regional.

Mr. McKinney summarized next steps including Barr incorporating feedback from the managers and having another review session with at the board's March workshop, if needed. He said Barr will create a memo summarizing the methodology and mapping. He noted the identified regional and local flood areas will be carried into Task 2.3 - flood prioritization and Task 2.4 – develop guidelines for project partnerships.

Manager Erin Hunker commented that if a flooding problem cannot be solved without impacting upstream or downstream properties, she would consider that regional flooding. Ms. Kieffer said the point Manager Hunker raises is why she is in favor of including tailwater-impacted areas as regional flood areas.

Mr. McKinney said that upcoming task includes defining NMCWD's role in addressing these flooding issues going forward. He explained the map will be a tool to help NMCWD put flooding issues into context of whether the flooding is local, multi-jurisdictional, or regional as NMCWD considers its involvement.

In response to President Cutshall's observation that cities could undertake projects that result in impacts downstream, Mr. Anhorn and Ms. Kieffer stated that such projects would require a NMCWD permit that would address such affects. President Cutshall said if the projects ultimately need permits, it would make sense for the district to be involved in the preliminary engineering.

Manager Hunker said cities often have their own consultants and she does not think the district should be dictating to cities about the design and the model should be a partnership.

President Cutshall said he has been pushing for this Atlas 14 flood mapping and resiliency work so the district has an understanding of watershed-wide flood risks and areas where flood storage can be picked up. He said then when the district issues a permit, the district will fully understand the impacts downstream.

Manager Butler noted the need for a NMCWD policy regarding multijurisdictional local flooding areas. Ms. Kieffer said she thinks that will be part of the steps to figure out partnership criteria and guidelines.

## II. Adaptive Level-Control System Joint Study Update

Mr. Anhorn reminded the managers that Brian Beck from Minnehaha Creek Watershed District attended the board's July 20, 2022, meeting to discuss the adaptive level-control system MCWD has developed for Lake Minnetonka and downstream Minnehaha Creek. He said the City of Edina, City of Richfield, and City of Bloomington, and Nine Mile Creek Watershed District have been discussing conducting an adaptive level-control system study.

Mr. Anhorn reported that Edina and Bloomington prepared and submitted a pre-proposal to the Minnesota Stormwater Research Council for grant funds for the study.

Ross Bintner stated the pre-proposal has been shortlisted by the Minnesota Stormwater Research Council, meaning a full proposal can be submitted. He said he is circling back to partners to firm up commitments and to get certainty that if the project is awarded grant funding that the project can easily move into next steps – putting the contract together and going forward with the study.

Mr. Bintner said the proposed project scope would address engaging stakeholders during adaptive level-control system development, permitting ALCS, and algorithm development and optimization. He said the study would also use and demonstrate engagement best practices; will engage the Minnesota

Department of Natural Resources directly on appropriations and wetlands. Other agencies will be invited to engage through a technical advisory committee.

He said results and findings will be included in abstracts submitted to local and regional conferences.

Mr. Bintner stated a project that engages all stakeholders can provide a forum and expertise to easily reopen the design for future phases. He reported a capstone project to evaluate use of ALCS is under way through the University of Minnesota. Mr. Bintner pointed out the potential grant funding source is the same source funding a portion of the Rosland Park stormwater filtration monitoring, with the majority of the funding coming from the Clean Water Land and Legacy Act, which is state sales tax funded. He said the City of Edina is willing to serve to manage the administration, with Barr Engineering consulting.

Mr. Bintner said if the project is awarded the Minnesota Stormwater Research Council funding, the requested commitment from partners will be approximately \$50,000 from the NMCWD, approximately \$115,000 each from city partners with Richfield at a lower level since the study area encompasses only a small portion of Richfield, and approximately \$165,000 to \$195,000 from the MSRC.

In response to a question from Manager Peggy Kvam, Mr. Bintner said adaptive level controls can predictively release water from storage hours or days ahead of a storm, and if another storm is not coming for days, the system can hold the water for days. He explained it means the treated water can be released ahead of storms and not released during small storms.

In response to a question from Manager Larry Olson, Mr. Bintner said the study with focus on the Adams Hill Pond and Centennial Lakes.

Manager Butler asked if there is still opportunity for other cities to join in with this study. Mr. Bintner responded the goal is to bring others into the process if the study is awarded the MSRC funding, through the technical advisory committee, so cities in the watershed who have similar situations might be asked to join. He said all the project partners will have a different role and if the district has people in mind who have a high stake in this study then the project group would want to welcome them. Manager Butler said she thinks there is potential for really big gains for cities.

Mr. Anhorn said staff is looking for the Board of Managers to authorize the district to enter into a partnership through an agreement with the group. Mr. Bintner said he sees this as getting to the point of having good agreement among the partners about the technology and on how the group would decide to get the most benefit and manage the risks. The partners will be utilizing expert advice from around the metro area and the state, and that several of the groups' sites will be considered.

Mr. Bintner said a commitment is not needed now, prior to submission of the full application by February 17. He said he understands that the board in interested in moving forward. He said if the study is awarded the MSRC funding, then the City of Edina would come to the district with a joint powers agreement or memorandum of agreement. He said the City of Edina is looking to serve as the administrative front end and would contract directly with Barr Engineering.

Mr. Welch clarified that the Edina wants to list NMCWD as a partner in the application, so the board should take action on that question.

Manager Butler moved, and Manager Kvam seconded, to authorize the administrator to work with the project partners led by Edina to submit the application to the MSRC. On a vote, the motion was approved.

# III. <u>Minnesota Association of Watershed Districts 2022 Annual Conference Discussion</u>

Mr. Anhorn heard an interesting presentation at the Minnesota Association of Watershed Districts' annual meeting about Forest Lake's program to pay farmers to keep cover crops on their land and even look at getting long-term leases on land to keep cover crops.

Mr. Anhorn commented he did not get to see the street sweeping presentation. Ms. Kieffer said Michael McKinney was part of that presentation with the Ramsey Washington Metro Watershed District. She said the method used a prioritization method and the University of Minnesota calculator that takes into account tree canopy estimates.

Manager Butler said she went to the program about neighborhoods putting in signage and keeping watch to prevent in-filling of wetlands. Manager Olson said he attended too, and had not been aware it is such a problem. He said education about that problem is important. Manager Butler said the breakfast on the Saturday, the last day of the event, is a good opportunity to meet people and pick their brains. She said the MAWD Board members have to stay for it, and it is a long event and a good chance to meet people.

#### **Chloride Legislation**

In response to an inquiry from Mr. Welch, the managers agreed by consensus that he should exercise his judgment on engaging in efforts on NMCWD's behalf to support the chloride limited-liability legislation.

## IV. Adjournment

It was moved by Manager Olson, seconded by Manager Kvam to adjourn the meeting at 7:38 p.m. On a vote, the motion was approved.

Respectfully Submitted,

Grace Butler, Secretary