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REGULAR MEETING MINUTES June 10, 2021

(Action by the SCWMC appears in blue, by the WMWMC in green and shared information in black.
*indicates items included in the meeting packet.)

I. A joint virtual meeting of the Shingle Creek Watershed Management Commission and the West Mississippi Watershed Management Commission was called to order by Shingle Creek Chairman Andy Polzin at 12:47 p.m. on Thursday, June 10, 2021.

Present for Shingle Creek were: David Vlasin, Brooklyn Center; Burton Orred, Jr., Crystal; Karen Jaeger, Maple Grove; Ray Schoch, Minneapolis; Bob Grant, New Hope; John Roach, Osseo; Andy Polzin, Plymouth; Wayne Sicora, Robbinsdale; Ed Matthiesen, Diane Spector, and Todd Shoemaker, Wenck-Stantec; Troy Gilchrist, Kennedy & Graven; and Judie Anderson, Amy Juntunen, and Beverly Love, JASS. Not represented: Brooklyn Park.

Present for West Mississippi were: David Vlasin, Brooklyn Center; Alex Prasch, Brooklyn Park; Gerry Butcher, Champlin; Karen Jaeger, Maple Grove; Harold Johnson, Osseo; Ed Matthiesen and Diane Spector, Wenck-Stantec; Troy Gilchrist, Kennedy & Graven; and Judie Anderson, Amy Juntunen, and Beverly Love, JASS.

Also present were: Melissa Collins, Mitch Robinson, and Samantha Nguyen, Brooklyn Park; Derek Asche, Maple Grove; Megan Hedstrom, New Hope; Ben Scharenbroich, Plymouth; Richard McCoy and Marta Roser, Robbinsdale; and Jacob Zea, Wenck/Stantec.

II. Agendas and Minutes.

Motion by Schoch, second by Jaeger to approve the **Shingle Creek agenda*** as amended. *Motion carried unanimously*.

Motion by Butcher, second by Johnson to approve the **West Mississippi agenda** as amended.* *Motion carried unanimously*.

Motion by Schoch, second by Roach to approve the **minutes of the May 13, 2021, regular and public meetings.*** *Motion carried unanimously.*

Motion by Johnson, second by Butcher to approve the **minutes of the May 13, 2021, regular meeting.*** *Motion carried unanimously.*

III. Finances and Reports.

- **A.** Motion by Schoch, second by Roach to approve the Shingle Creek **June Treasurer's Report* and claims** totaling \$72,548.82. Voting aye: Vlasin, Orred, Jaeger, Schoch, Grant, Roach, Polzin, and Sicora; voting nay none; absent Brooklyn Park.
- **B.** Motion by Schoch, second by Orred to accept the **2020 Audit Report.** *Motion carried unanimously.* It was prepared by Johnson and Company, Ltd. and will be submitted to the State Auditor as prescribed by Statute by June 30, 2021.



- **C.** Motion by Johnson, second by Jaeger to approve the **West Mississippi June Treasurer's Report* and claims** totaling \$19,664.22. Voting aye: Vlasin, Prasch, Butcher, Jaeger, and Johnson; voting nay none.
- **D.** Motion by Johnson, second by Butcher to accept the **2020 Audit Report.** *Motion carried unanimously.* It was prepared by Johnson and Company, Ltd. and will be submitted to the State Auditor as prescribed by Statute by June 30, 2021.

IV. Open Forum.

Staff will survey the members regarding returning to in-person meetings.

V. Project Reviews.

A. SC2021-03 Walser Hyundai, Brooklyn Park.* Redevelopment of two existing dealerships into a single building with parking lots and utility improvements on a 5.1-acre site located at 8100 Lakeland Avenue North, Brooklyn Park. The existing sites were constructed without any treatment or rate control. Prior to reconstruction the site was 83.4% impervious. Following redevelopment, the site will be 78.6 percent impervious with 4.0 acres of impervious surface, a decrease of 0.25 acres. A complete project review application was received May 13, 2021.

To comply with the Commission's water quality treatment requirement, the site must provide ponding designed to NURP standards with dead storage volume equal to or greater than the volume of runoff from a 2.5" storm event, or BMPs providing a similar level of treatment - 85% TSS removal and 60% TP removal. Infiltrating 1.3 inches of runoff, for example, is considered sufficient to provide a similar level of treatment. If a sump is used the MnDOT Road Sand particle size distribution is acceptable for 80% capture.

Runoff from the site is proposed to be routed to two underground infiltration galleries, which have the capacity to infiltrate 1.3 inches of runoff in less than 48 hours. The applicant meets Commission water quality treatment requirements.

Commission rules require that site runoff be limited to predevelopment rates for the 2-, 10-, and 100-year storm events. Runoff from the site is routed to two underground infiltration galleries and then to city storm sewer. Two small areas that are entirely pervious grassy areas flow to adjacent parcels. Those areas are zero discharge except for 100-year events, when the rate of runoff is 0.2 and 0.1 cfs. A small area along the boulevard flows directly into Lakeland Street. The post-construction runoff rates for that area are less than pre-construction rates. The bulk of the site is routed through the galleries, and post construction rates are less than pre-construction rates. The applicant meets Commission rate control requirements.

Commission rules require the site to infiltrate 1.0 inch of runoff from new impervious area within 48 hours. While the site as redeveloped has 0.25 acres less impervious surface, the newly reconstructed impervious area on this site is just over 4.0 acres, requiring infiltration of 0.44 acre-feet, or 18,936 CF within 48 hours. The proposed infiltration galleries provide 21,083 CF of storage and can infiltrate the required volume within 48 hours. The applicant meets Commission volume control requirements.

The erosion control plan includes a rock construction entrance, perimeter silt fence, inlet protection, and a turf establishment plan. The erosion control plan meets Commission requirements.

The National Wetlands Inventory does not identify any wetlands on site. The applicant meets Commission wetland requirements. There are no Public Waters on this site. The applicant meets Commission Public Waters requirements.



There is no FEMA-regulated floodplain on this site. Stormwater storage is underground. The applicant meets Commission floodplain requirements.

The site is located in a Drinking Water Management Area (DWSMA) but is outside of the Emergency Response Area. Therefore, infiltration is permitted, but infiltrated water must first filter through 1 foot of soil, the top four inches of which are amended topsoil, and the bottom 8 inches of which are tilled. The applicant proposes 18" of fine filter aggregate atop native soil. The applicant meets Commission drinking water protection requirements.

A public hearing on the project was conducted on June 9, 2021, as part of Planning Commission and City Council review of this project, meeting Commission public notice requirements.

A draft Operations & Maintenance (O&M) agreement between the applicant and the City of Brooklyn Park was not provided.

Motion by Jaeger, second by Schoch to advise the City of Brooklyn Park that project review SC2021-03 is approved with the following conditions:

- **1.** Provide a complete O&M agreement between the applicant and the City of Brooklyn Park for all stormwater facilities on the project site.
- **2.** Demonstrate by double ring infiltrometer or witness test that the site can meet the design infiltration rate of 0.8 inches/hour.

Motion carried unanimously.

B. SC2021-04 Keller Williams, Maple Grove.* Construction of an office building, parking lots, utilities, and stormwater treatment on a 4.6-acre site located at 104102 73rd Avenue North, Maple Grove. Following development, the site will be 35.8 percent impervious with 1.65 acres of impervious surface, an increase of 1.65 acres. A complete project review application was received May 28, 2021.

To comply with the Commission's water quality treatment requirement, the site must provide ponding designed to NURP standards with dead storage volume equal to or greater than the volume of runoff from a 2.5" storm event, or BMPs providing a similar level of treatment - 85% TSS removal and 60% TP removal. Infiltrating 1.3 inches of runoff, for example, is considered sufficient to provide a similar level of treatment. If a sump is used the MnDOT Road Sand particle size distribution is acceptable for 80% capture.

Runoff from the site is proposed to be routed to an infiltration basin that feeds into a pond. 6,589 CF of infiltration are required and 6,707 CF are provided. The applicant must show a minimum 3' separation between the bottom of the infiltration basin and the seasonally high ground water. It is unclear if the applicant meets Commission water quality treatment requirements due to the apparent high normal water level of the adjacent pond.

Commission rules require that site runoff be limited to predevelopment rates for the 2-, 10-, and 100-year storm events. Runoff from the site is directed into an infiltration basin. The applicant meets Commission rate control requirements.

Commission rules require the site to infiltrate 1.0 inch of runoff from new impervious area within 48 hours. The new impervious area on this site is 1.65 acres, requiring infiltration of 6,589 CF within 48 hours. The applicant proposes to an infiltration basin that has the capacity to infiltrate the required volume within 48 hours. The applicant meets Commission volume control requirements.



The erosion control plan includes a rock construction entrances, perimeter silt fence/biolog, silt fence surrounding detention ponds/infiltration basins, inlet protection, rip rap at inlets. The erosion control plan meets Commission requirements.

The National Wetlands Inventory does not identify any wetlands on site. The applicant meets Commission wetland requirements. There are no Public Waters on this site. The applicant meets Commission Public Waters requirements.

There is no FEMA-regulated floodplain on this site. The low floor elevations of the buildings are at least two feet higher than the high-water elevation of the detention ponds/infiltration basins according to Atlas 14 precipitation. The adjacent pond 100-yr HWL is 887.2 and the proposed building first floor elevation is 893.0. The applicant meets Commission floodplain requirements.

The site is not located in a Drinking Water Management Area (DWSMA). The applicant meets Commission drinking water protection requirements.

The project is schedule to be on the June 14, 2021, Planning Commission meeting. The Commission public notice requirement has been met.

A draft Operations & Maintenance (O&M) agreement between the applicant and the City of Maple Grove must be provided.

Motion by Jaeger, second by Orred to advise the City of Maple Grove that project review SC2021-04 is approved with the following conditions:

- **1.** Provide a complete O&M agreement between the applicant and the City of Maple Grove for all stormwater facilities on the project site. (A draft agreement has been provided.)
- **2.** Demonstrate that the proposed infiltration basin has a minimum 3-foot separation between the basin bottom and the seasonally high ground water or revise the pond to a wet basin following MPCA guidelines.
- **3.** Demonstrate by double ring infiltrometer or witness test that the site can meet the design infiltration rate of 0.08 inches/hour.

Motion carried unanimously.

C. WM-2021-07 Twin Cities Twisters, Champlin.* Construction of two-story athletic facility, parking lot, and stormwater treatment area on 4.0 acres located at Business Park Boulevard North, Champlin. Following development, the site will be 70% percent impervious with 2.80 acres of impervious surface, an increase of 2.80 acres. A complete project review application was received May 24, 2021.

To comply with the Commission's water quality treatment requirement, the site must provide ponding designed to NURP standards with dead storage volume equal to or greater than the volume of runoff from a 2.5" storm event, or BMPs providing a similar level of treatment - 85% TSS removal and 60% TP removal. Infiltrating 1.3 inches of runoff, for example, is considered sufficient to provide a similar level of treatment. If a sump is used the MnDOT Road Sand particle size distribution is acceptable for 80% capture.

Runoff from 92% of the site is to be routed to an infiltration basin on the east property line. The 1.3" volume is 13,199 CF and the applicant is proposing 24,468 CF of infiltration capacity. The applicant meets Commission water quality treatment requirements.



Commission rules require that site runoff be limited to predevelopment rates for the 2-, 10-, and 100-year storm events. Runoff from the site is controlled by the infiltration basin and outlet control structure. The applicant meets Commission rate control requirements.

Commission rules require the site to infiltrate 1.0 inch of runoff from new impervious area within 48 hours. The new impervious area on this site is 4.0 acres, requiring infiltration of 10,153 CF within 48 hours. The applicant proposes to install an infiltration basin that has the capacity to infiltrate 24,468 CF within 48 hours. The applicant meets Commission volume control requirements.

The erosion control plan includes a rock construction entrance, perimeter silt fence/biolog, silt fence surrounding detention ponds/infiltration basins, inlet protection. The erosion control plan meets Commission requirements.

The National Wetlands Inventory does not identify any wetlands on site. The applicant meets Commission wetland requirements. There are no Public Waters on this site. The applicant meets Commission Public Waters requirements.

There is no FEMA-regulated floodplain on this site. The low floor elevation of the building (864.0) is at least two feet higher than the high-water elevation of the detention ponds/infiltration basins (857.5) according to Atlas 14 precipitation. The applicant meets Commission floodplain requirements.

The site is located in a Drinking Water Management Area, but is outside of the Emergency Response Area. Therefore, infiltration is permitted, but infiltrated water must first filter through 1 foot of soil, the top four inches of which are amended topsoil, and the bottom 8 inches of which are tilled. The applicant proposes infiltrating no faster than 0.8 inches/hour. The applicant meets Commission drinking water protection requirements.

The City of Champlin will send notification to properties within 350' of the project during the week of June 6, 2021, and the project is scheduled to appear before the Planning Commission on June 21, 2021. This notification meets the Commission public notice requirements.

A draft Operations & Maintenance (O&M) agreement between the applicant and the City of Champlin must be provided.

Motion by Butcher, second by Johnson to advise the City of Champlin that project review WM2021-07 is approved with the following conditions:

- **1.** Provide a complete O&M agreement between the applicant and the City of Champlin for all stormwater facilities on the project site.
- **2.** Demonstrate by double ring infiltrometer or witness test that the site can meet the design infiltration rate of 0.8 inches/hour post construction.

Motion carried unanimously.

D. WM2021-08 610 Commerce Center Phase 3, Brooklyn Park.* Construction (third phase) of office/warehouse building on 7.475 acres located at 6360 West Broadway, Brooklyn Park. Following development, the site will be 85 percent impervious with 5.0 acres of impervious surface, an increase of 5.0 acres. A complete project review application was received May 27, 2021.

To comply with the Commission's water quality treatment requirement, the site must provide ponding designed to NURP standards with dead storage volume equal to or greater than the volume of runoff



from a 2.5" storm event, or BMPs providing a similar level of treatment - 85% TSS removal and 60% TP removal. Infiltrating 1.3-inches of runoff, for example, is considered sufficient to provide a similar level of treatment. If a sump is used the MnDOT Road Sand particle size distribution is acceptable for 80% capture.

Runoff from the site is proposed to be routed to two infiltration basins, one on the east and one on the west. The applicant is meeting the 1.3" infiltration volume for the combined three buildings. 93,610 CF are required and 102,622 CF are provided. The applicant meets Commission water quality treatment requirements.

Commission rules require that site runoff is limited to predevelopment rates for the 2-, 10-, and 100-year storm events. Runoff from the site is directed into two infiltration basins. The applicant meets Commission rate control requirements.

Commission rules require the site to infiltrate 1.0 inch of runoff from new impervious area within 48 hours. The total impervious area on this site requires infiltration of 93,610 CF within 48 hours. The applicant proposes two infiltration basins that have the capacity to infiltrate 102,622 CF within 48 hours. The applicant meets Commission volume control requirements.

The erosion control plan includes rock construction entrances, perimeter silt fence/biolog, silt fence surrounding detention ponds/infiltration basins, inlet protection, rip rap at inlets. The erosion control plan meets Commission requirements.

The National Wetlands Inventory does not identify any wetlands on site. The applicant meets Commission wetland requirements. There are no Public Waters on this site. The applicant meets Commission Public Waters requirements.

There is no FEMA-regulated floodplain on this site. The low floor elevations of the buildings are at least two feet higher than the high-water elevation of the detention ponds/infiltration basins according to Atlas 14 precipitation. The 100-yr elevations are 872.30 for the east and 876.90 for the west ponds compared to the building first floor elevation of 882.0. The applicant meets Commission floodplain requirements.

The site is not located in a Drinking Water Management Area (DWSMA). The applicant meets Commission drinking water protection requirements.

The project has not had a public hearing or is scheduled to be on a Planning Commission meeting. The applicant is considering a revised plan with a smaller office building. The public notification does not meet Commission public notice requirements.

A draft Operations & Maintenance (O&M) agreement between the applicant and the City of Brooklyn Park was not provided.

Motion by Prasch, second by Butcher to advise the City of Brooklyn Park that project review WM2021-08 is approved with the following conditions:

- 1. Provide a complete O&M agreement between the applicant and the City of Brooklyn Park for all stormwater facilities on the project site.
- 2. Demonstrate by double ring infiltrometer or witness test that the site can meet the design infiltration rate of 0.8 inches/hour.
- 3. Provide documentation that the public within 300 feet of the project has been informed of the proposed project.



Motion carried unanimously.

E. WM2021-09 / SC2021-05 CenterPoint Energy – Wyoming Avenue – Brooklyn Park.* Installation of 10,746 LF of 8, 6 and 4" plastic and steel natural gas pipeline and a new regulator station on a 4.9-acre site. The south endpoint of the project is located at Wyoming and 85th Avenues, the north endpoint is located at Winnetka Avenue and Highway 610. Following development, a 1,000 SF pad will be added at a regulator station. A complete project review application was received May 21, 2021.

To comply with the Commission's water quality treatment requirement, the site must provide ponding designed to NURP standards with dead storage volume equal to or greater than the volume of runoff from a 2.5" storm event, or BMPs providing a similar level of treatment - 85% TSS removal and 60% TP removal. Infiltrating 1.3-inches of runoff, for example, is considered sufficient to provide a similar level of treatment. If a sump is used the MnDOT Road Sand particle size distribution is acceptable for 80% capture.

The proposed project has no new increase in impervious area and, therefore, meets Commission requirements.

Commission rules require that site runoff is limited to predevelopment rates for the 2-, 10-, and 100-year storm events. There is no change in impervious surface and, therefore, the applicant meets the Commission rate control requirements.

Commission rules require the site to infiltrate 1.0 inch of runoff from new impervious area within 48 hours. The new impervious area on this site is 0 acres, requiring infiltration of 0 acre-feet (CF) within 48 hours. The applicant meets Commission volume control requirements.

The erosion control plan includes (a) perimeter silt fence/biolog, silt fence, inlet protection, mulch, road cleaning, sandbag, and seeding. The erosion control plan meets Commission requirements.

The National Wetlands Inventory does not identify any wetlands on site. The applicant meets Commission wetland requirements. There are Public Waters on this site. The project proposes to go under Edinburgh Channel and proposes no fill. The applicant meets Commission Public Waters requirements.

The project does not affect FEMA-regulated floodplain. However, there is one proposed crossing of Edinburgh Channel near 89th and Wyoming Ave. It is advised the top of the proposed pipe be a minimum of 4' below the existing channel bottom for safety and unanticipated channel movement.

The site is not located in a Drinking Water Management Area (DWSMA). [The site is located in a Drinking Water Management Area, but is outside of the Emergency Response Area. Therefore, infiltration is permitted, but infiltrated water must first filter through 1 foot of soil, the top four inches of which are amended topsoil, and the bottom 8 inches of which are tilled. The applicant does not need to infiltrate.] The applicant meets Commission drinking water protection requirements.

The applicant, through the Corps of Engineers General Permit application process, has notified all parties within 300 feet of construction, meeting Commission public notice requirements.

A draft Operations & Maintenance (O&M) agreement between the applicant and the City of Brooklyn Park is not needed.

Motion by Jaeger, second by Prasch to advise the City of Brooklyn Park that project review WM2021-09 is approved conditioned that an as-built elevation be provided for the pipe crossing of the channel near 89th and Wyoming Ave. to show a minimum 4' separation between the top of the new pipe and the bottom of the existing channel.



Motion carried unanimously.

Motion by Schoch, second by Roach to advise the City of Brooklyn Park that project review SC2021-005 is approved with the same condition.

Motion carried unanimously.

VI. Watershed Management Plan.

A. 2021 Maximum Levy.*

At this time, the Commissions must set the maximum amounts of capital projects levy they expect to certify to Hennepin County. The actual levies will be certified in September, after the Commissions hold public hearings on the proposed projects. Tables 1 and 2 show the CIP projects that will be considered in September. The Maximum Levy sets the ceiling for the capital levy; the Commissions can certify a lesser levy amount but cannot increase it. In 2016 the Commissions began levying an additional 5% to cover administrative costs, and an additional 1% to cover uncollected levies, based on the historical rate of uncollectables. These maximum levies will be forwarded to Hennepin County by mid-June.

Table 1. Shingle Creek 2021 CIP Projects (2022 levy).

Project	Total Est. Cost	City/ Private	Grant	Commission Share	Total Levy Amount
Cost share (city projects)	\$200,000	\$100,000	0	\$100,000	\$106,050
Partnership cost share (private projects)	50,000	0	0	50,000	53,025
Palmer Lake Estates Bass Creek Restoration	600,000	0	0	600,000	636,300
Phase 2 SRP Channel Extension	125,000	0	0	125,000	132,565
Subtotal	\$975,000	\$100,000	\$0	\$875,000	
5% additional for legal/admin costs				43,750	
Subtotal				918,750	
TOTAL LEVY (101% for uncollectable)				\$927,940	\$927,940

Motion by Schoch, second by Roach to certify \$927,940 as Shingle Creek's 2021 levy (pay 2022). *Motion carried unanimously*.

Table 2. West Mississippi 2021 CIP Projects (2022 levy).

Project	Total Estimated	City/ Private	Grant	Commission Share	Total Levy Amount
Cost share (city projects)	\$100,000	\$50,000	0	\$50,000	\$53,025
Partnership Cost Share	100,000	0	0	100,000	106,050
Subtotal	\$150,000	\$50,000	\$ 0	\$150,000	
5% additional for legal/admin costs				7,500	
Subtotal				157,500	
TOTAL LEVY (101% for uncollectable)				\$159,075	\$159,075



Motion by Jaeger, second by Butcher to certify \$159,075 as West Mississippi's 2021 levy (pay 2022). *Motion carried unanimously.*

B. Technical Advisory Committee Report.

Matthiesen and McCoy recapped the **Technical Advisory Committee meeting** held earlier today. Shoemaker presented an update of the Ryan Lake Subwatershed Assessment; Spector led the members in a brainstorming discussion of the elements of the Fourth Generation Watershed Management Plan; and Staff provided members with an update on the SRP Channel Filter project. These items will also be discussed later in this meeting.

The next TAC meeting is scheduled for 11:30 a.m., prior to the Commissions' July 8, 2021, regular meeting.

C. Fourth Generation Watershed Management Plan.*

Spector led a brainstorming session to start the members thinking about what to include in the Fourth Generation Watershed Management Plan and how to proceed. Staff will use the outcome of this discussion to put together a scope of work and budget for consideration at the July TAC/Commission meetings.

The Commissions' Third Generation Plan was approved by the Board of Water and Soil Resources (BWSR) March 2013 and adopted in April 2013. The Plan covers the period 2013-2022, meaning the Commissions should plan on achieving a BWSR-approved plan by the end of 2022 so it can be in place to cover the period 2023-2032. To allow six months for the review and approval process, a draft Fourth Generation Plan should be completed by mid-2022.

Under State Statues and Minnesota Rules 8410, which govern what must be included in the watershed management plan, much of the background information that was developed over the course of the first three plans does not need to be repeated except to reflect any changed conditions, such as updated land use information, or newly-identified Impaired Waters. Most of the focus will be on updating goals and policies and the Implementation Plan. As long as the Commissioners meet the regulatory minimums for what must be in the Plan, the rest is up to them.

Listed below are a few things that have come up in previous discussions or from Staff brainstorming. These are a starting point; Commissioners are urged to suggest other topics to be considered. The purpose of this discussion is not to solve or debate these questions but for Staff to get a better understanding of the level of effort to address them and to complete the Plan update.

- (1) Do the Commissions wish to revisit merging into a single Joint Powers Organization or remain separate but jointly administered? The current JPA terminates January 1, 2025, so at a minimum it must be renewed during the life of the Fourth Generation Plan.
- (2) Presumably the existing TAC will serve as the TAC for the Plan. Do you wish to recruit and involve a Citizens Advisory Committee (CAC)? If so, how?
- (3) How do you want to involve elected officials or City Managers? In past planning we have had a single meeting for City Managers to get them up to speed and hear their needs and thoughts.
- (4) What type of public participation process should be undertaken for this Plan? What should be the role of the lake associations? Since much of the watershed falls into the MPCA's Areas of Environmental Justice Concern, should we plan on making a special effort to reach out to underserved communities or non-English speakers?



- (5) Do you want the Plan to be a simple update that consists mainly of Implementation Plan, or do you want a stand-alone plan that also incorporates all the inventory data and TMDL 5-Year Review findings that serves as a more comprehensive volume?
- (6) One big policy question is: as implementation expands from solely "brick and mortar" type capital projects to include other ongoing or maintenance type activities such as rough fish management, aquatic invasive species management, maintenance of installed projects, etc., who should be responsible for each and how should they be financed? Where is the line between city responsibility and Commission responsibility?
- (7) Another big policy question is addressing sustainability and resiliency and addressing the impacts of climate change on water and natural resources. What are your thoughts about level of focus?
- (8) Are there updates to the current Rules and Standards that need to be considered? At a minimum there are some modifications that are necessary to reflect the most recent General Stormwater permit, but are there others?
- (9) Are there other policy topics that need to be covered during the plan process?

Generally, the comments from the Commissioners seemed to reflect those of the TAC members. Spector will return to the July TAC and regular meetings with a scope of content as well as a calendar/timeline of activities to be completed.

VII. Water Quality.

Ryan Lake Subwatershed Assessment.* Earlier this year the Commission authorized development of a subwatershed assessment for Ryan Lake to assess the potential impacts of pumping discharge from two landlocked systems into Ryan - the Gaulke Pond chain in the city of Crystal, and Crystal Lake in Robbinsdale. Each depends on permanent pumps to manage water levels and minimize flooding. Over the six years from 2014 to 2019, the Twin Cities received what was effectively an extra year of precipitation. This required each City to actively manage pumping more than ever before and motivated this study to determine potential downstream effects of increasing the discharge from and changing the timing of pumping from Gaulke Pond and Crystal Lake.

Here, and at the TAC meeting earlier today, Staff presented the results of this study, which was based on a model created by merging two existing PCSWMM hydrologic and hydraulic models: the Shingle Creek Watershed Management Commission preliminary HUC-8 model ("Commission Model") and the Gaulke Pond watershed model developed for the City of Crystal Central Core Stormwater Project.

Two baseline or existing conditions were established based on existing Minnesota Department of Natural Resources (DNR) permits for pumping from Crystal Lake. Staff then used the baseline models to evaluate eleven different alternatives or modifications to Gaulke Pond, Crystal Lake and other watershed features. These alternatives include modifying storm sewer, adding storage in the upper watershed, and various pumping scenarios. General conclusions from the alternatives analysis included:

- **A.** Crystal Lake slight reductions to the maximum water surface elevations but significant reductions to the duration of high-water on Crystal Lake for the 10-, 50-, and 100-year events.
- **B.** Gaulke Pond maximum water levels were reduced by 0.1 to 0.3 feet and the durations of high-water reduced by up to one-third.
 - C. Twin Lake and Ryan Lake –
- **1.** Some alternatives may increase the duration of high-water on Twin Lake with a simultaneous reduction of high-water duration on Ryan Lake.



- 2. Some alternatives will increase the 100-year flood elevation of Ryan Lake by up to 0.1 feet compared to the Baseline 1 Model. However, there is no change to the 100-year flood elevation when compared to Baseline 2 as a result of proposed pumping on Crystal Lake and Gaulke Pond, which also reflects an existing permitted operating condition.
- **D.** Permanent pumping from Crystal Lake to Ryan Lake may increase total phosphorus loading to Ryan Lake by up to four percent. This is not significant, so pumping from Crystal Lake to Ryan Lake is not expected to negatively impact the water quality of Ryan Lake.

VIII. Grant Opportunities.

SRP Channel Filter Project.* The Commission has previously discussed a proposed project to extend an iron-enhanced sand filter down the Wetland 639W overflow channel. This is the follow up to the SRP Reduction Project study that evaluated different types of filter material to see which was best at removing soluble reactive phosphorus (SRP) from wetland discharge. The SRP Channel Filter Project will line about 400 feet of the channel downstream of the wetland's overflow weir with iron-enhanced sand. Hennepin County has awarded the Commission a \$75,000 Opportunity Grant for the project, matched by \$50,000 from the Commission's Closed Projects Account. The estimated cost of construction is \$100,000, with design, construction oversight, and follow up monitoring estimated at \$25,000.

Included in the meeting packet is a Scope of Work* between the Commission and Wenck/Stantec to design the project and perform construction observation. The City of Crystal has agreed to serve as the contracting agent for the project. Staff recommends authorizing the Commission's attorney to work with the City to prepare a cooperative agreement specifying terms, similar to those developed for other projects where the City constructs the project at the Commission's request and then is reimbursed for its costs.

Motion by Schoch, second by Roach to approve the Scope of Work for this project and to approve the chair's execution of the Cooperative Agreement between the Shingle Creek Commission and the City of Crystal upon successful review by the Commission's attorney. *Motion carried unanimously*.

IX. Education and Public Outreach.

A. At recent meetings of the **West Metro Water Alliance** (WMWA) members have been concentrating on education and outreach items in the new NPDES General Permit, focusing on chloride and pet waste. WMWA subgroups reviewed existing materials relating to chloride and bacteria to determine if they meet the new requirements or could be revised to do so, and to identify any needs for additional materials. The subcommittees are completing this assessment to determine additional needs and required resources (e.g., design assistance, fabrication, printing) as well as a plan for disseminating the materials.

It is anticipated this work can be completed using the WMWA Special Projects budget, which had a balance of \$10,700 at the end of 2020. The agreement between the four WMOs in WMWA (Bassett Creek, Elm Creek, Shingle Creek and West Mississippi) requires that Special Projects be approved by the four WMOs before expenditures can be made. It is intended that the assessment will be available for consideration at the July meetings of the WMOs. The goal is to have all the work completed by the end of 2021.

B. Sharon Meister, **Watershed PREP** educator has retired. WMWA is seeking to hire a new educator and to begin preparing for in-person classes in the fall.



C. The July meeting, a virtual meeting, is scheduled for 8:30 a.m., Tuesday, July 13, 2021. The Zoom number is https://us02web.zoom.us/j/922390839. Or call in at any of these numbers using meeting ID: 922 390 839: (1) +1 301 715 8592 US (Germantown); (2) +1 312 626 6799 US (Chicago); (3) +1 929 205 6099 US (New York); or (4) +1 253 215 8782 US (Tacoma). The passcode is water.

X. Communications.

A. May Communications Log.* No items required action.

Roser noted that the Crystal Lake alum treatment was postponed because of unfavorable lake conditions due to the high temperatures.

B. Staff Report.* Updates were provided on the Watershed Based Implementation Funding projects; the Crystal Lake, Bass and Pomerleau Lakes, and Meadow Lake Management Plans; the SRP Channel Extension project; and the Connections II and Bass Creek Restoration projects. It was also noted that the City of Crystal held a dedication ceremony for the new Becker Park on May 22.

XI. Other Business.

XII. Adjournment. There being no further business before the Commissions, the joint meeting was adjourned at 3:13 p.m.

Respectfully submitted,

Judie A. Anderson, Recording Secretary

JAA:tim

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