

MEMORANDUM

TO: Board of Directors

FROM: Watershed Management Planning Committee

DATE: August 13, 2018

SUBJECT: Summary of Watershed Management Planning Committee Meeting

MISSION STATEMENT

The mission of the Watershed Management Planning Group (WMPG) is to help protect existing water uses and watershed health in the Upper Gunnison Basin in the face of pressure from increased water demands and permanent reductions in water supply.

A meeting of the Watershed Management Planning (WMP) Committee was held on August 13, 2018 at 6:00 p.m.

George Sibley, Ashley Bembenek, Michelle Pierce, Stacy McPhail, Julie Nania, Erin Wilson, Chris Kurtz, Camille Richard, Jesse Kruthaupt, Dan Olson, Bob Robbins, Cheryl Cwelich, Taylor Paulson, Molly McConnell, Amy Vondren, Rose Tocke, Ashley Hom, Nicole Seltzer, Jackie Brown, Julie Pearson, George Gibson, Randy Ewing, Frank Kugel and Beverly Richards were in attendance.

George Sibley called the meeting to order. He welcomed the visitors and introductions were made. This meeting involves a brief overview of progress on the needs assessment for the watershed management planning process which involves all the sub basins in the watershed.

Wilson Water Group Update

Needs Assessment and Stream Modeling – Erin Wilson and Chris Kurtz with Wilson Water Group gave a presentation on the stream modeling developed as part of the needs assessment phase of the planning process. They have been compiling an enormous amount of data that will be useful for everyone. This presentation shows what can be done with this data in the needs assessment phase of the watershed management planning process. The presentation file will be available on the District's website.

The modeling platform they chose included an incredible amount of information about how water is moved throughout the system. The difference in this model is that they are also working with prior appropriations and water rights. They are also looking at ways to improve recreational and environmental flows as well as agricultural shortages.

They have been using StateMod which is also used by the CWCB and the State Engineers Office. The Colorado Decision Support System (CDSS) is an existing model

being used but this does not include the detail the WMPG was looking for in the needs assessment. This model will be a more accurate representation of what is happening in this basin and that can be represented on a daily basis. The model includes a general allocation model and will be unique in that it includes data that represents the upper Gunnison basin. The current model will include 100% of the consumptive uses for the period of 1975-2013.

Erin said this model can also include historically observed hydrologic variations, palaeohydrology, and climate projective hydrology as it is more flexible in those regards. The weaknesses of the model are that it does not track rainfall runoff, address water quality issues, or one-time only operations that address intentional shortages. This model calculates using natural flows and can provide information about inflow hydrology, diversions, return flows, changes in reservoir storage, and evaporation

WWG have also modeled physical system revisions which include ditch assignments and irrigated acreage. These were done by the state on a fairly high level but did not include the true ditch and field connections. WWG did work with the water commissioners to divide the fields and reassign to the correct ditches, and several of the fields were combined and assigned to multiple ditches.

Erin said they also met with larger ranchers to review irrigation operations and assure accurate representation of common irrigation practices and dry-year gentlemen's agreement on the Ohio Creek and East River tributaries. This also includes revised return flow location and timing. They have revised 70% of the irrigated parcels in the Ohio Creek basin.

The data sources for this model are the physical systems and include water demands, irrigation demands, municipal and industrial demands, and reservoir demands. Erin said the baseline model can also show historic demands and represent historical supply limits and irrigation practices. The baseline demands also represent the current demands over a longer hydrologic period based on current irrigated acreage, crop types, and irrigation methods. This will also show why there are shortages which will be important for planning and not limit users to historical practices on beneficial uses and water rights.

The types of output that can be gathered from the model include historic stream flows, baseline stream flows, stream diversions, return flow, crop irrigation demands, and actual consumptive use and consumptive shortages. Some modeling examples that can also be used include the benefits of irrigation efficiency improvements. This model also has predictive capabilities such as showing the consequence of two consecutive years like 2012 on Upper Gunnison water supplies.

Field Assessment Update – Ashley Bembenek said they are two-thirds complete on field assessment in the East River, 25% complete in the Lake Fork, and 10% complete on Ohio Creek. The assessments have been going smoothly.

George said the big picture is that this watershed management planning process is the result of anticipated continued growth of 50 to 100% by the middle of the century. There is already less water in the system farther downstream. In 2013 the state began the Colorado Water Plan and then planning began in each of the major basins in order to deal with future needs which includes urban growth and the reality of less water. The needs assessment process will help in planning for more people and less water in this basin.

Grant and Assessment Sub-Committees Update

Grants Sub-committee - Camille said the Grants Sub-Committee met on July 23rd. The committee discussed their purpose, upcoming grant opportunities, how to prepare these applications, and how to report using different databases. Camille said she has developed a Google sheet and this will be used to share information across the team.

The next CWCB watershed restoration grant is due in November. The committee members should review the main framework to compare with CWCB year one and two statement of work. This will give the committee a better idea of how to go forward and will help come up with a new scope of work for future grant opportunities.

Julie Nania said she was tasked with speaking to Chris Sturm of CWCB about future funding strategies. He suggested we lump together the wrap up of the first three basins with the funding to get the next group of sub-basins off the ground. This could include ground assessments and modeling work in some of these basins and could be included in the funding request for November. He also suggested we keep the requests at \$100,000 per request and recommends that the flow methods criteria include the Montana method, and Julie said they are on track with that.

Camille said the next committee meeting will be held on August 27th beginning at 3:30 p.m. and the committee will focus on the framework and on starting to revise the statement of work, budget, and timetable.

Assessment Sub-committee – Ashley said she and Chris Kurtz gave a more nuts and bolts presentation of the modeling at the Assessment Sub-Committee meeting also held on July 23rd. This included how the model works, assessment methods, field assessments, and how output and existing instream flows apply to the model. This will help to identify flows based on the average annual gage flows. It will also help to identify how flows can be assigned a flow criterion to protect environmental and recreations flows. They have been working with the Montana method and customize as needed for each area.

The committee also discussed what the group needs with respect to the assessments. Chris gave an example of what the model can provide, and the committee will focus on what unique issues exist in each sub-basin. The needs assessment should be completed by the end of the year. At that point we will be able to come back to the

stakeholders for input and start generating options for what can be done to address their issues.

Sub-Basin Coordinators Updates

East River – Julie Nania said they are making great progress with recreational users. She has been working with the Slate River Users Group which is sponsored by the CB Land Trust and supported by the District. This group was established due to concerns from landowners about a large increase of recreational users on the Upper Slate River. Their goal is to come up with some recommendations to address the increases and recreational flows. This includes determining when the Slate may be too low to float as well as establishing a recreational flow method. They have had several events centered around this topic which have included good discussions and numerous surveys being completed. These events have been developed for recreational water users and have focused on recreation issues and flows.

Lake Fork and Cebolla – Camille said there have been three field trips with the River Restoration Planning effort. These have been brainstorming opportunities to look at properties owned by the town of Lake City and will result in the development of comprehensive maps that will identify natural resources and infrastructure needs.

She has also been speaking with the Powderhorn Community Association which is located on the confluence of Powderhorn Creek and Cebolla Creek where there are a number of issues. There is a possibility for demonstration projects being developed in the area.

Frank Kugel said there has been a temperature gage installed on the Lake Fork at Gateview which will record water temperatures in this area. Frank also said that CWCB has requested the release of 200 acre-feet of water from Lake San Cristobal to fulfill an instream flow right they have on the Lake Fork. This requirement is part of their decree and the District is obligated to release the water.

Ohio Creek – Jesse Kruthaupt said he has been more engaged with water users on Ohio Creek and has been using the maps created. There has been some feedback on the changes and more interest in how the system is broken down. There are several users who are looking forward to seeing how the model works and he will work on coordinating a stakeholder group meeting focused on these discussions.

Meeting Wrap-up and Action Items

In preparation for the next meeting the following items were discussed:

- The next meeting for the Watershed Management Planning Committee will be September 10, 2018 beginning at 6:00 p.m.

Action items include:

- Staff to send out framework and statement of work for review by sub-committee.
- Grants sub-committee will meet to begin discussion of revision to framework and statement of work for future funding opportunities. Meeting is scheduled for August 27, 2018, beginning at 3:30 p.m.
- Field assessments and needs assessment will continue through the fall with completion anticipated by end of year.

Adjournment

The meeting was adjourned at 7:35 p.m.