The Water Conservation and Drought Management Advisory Board held its regular meeting on June 10, 2020. Per Executive Order 2020-5 issued by Governor Gary R. Herbert on March 18, 2020, this meeting was conducted electronically. An anchor location was not provided. An audio recording of the meeting is archived at [http://www.utah.gov/pmn/index.html](http://www.utah.gov/pmn/index.html). A video recording is archived at [https://www.youtube.com/watch?v=lyGQBn6QEFE](https://www.youtube.com/watch?v=lyGQBn6QEFE).

**Regular Meeting—Call to Order and Attendance:**  
Water Board Chair Kara Dohrenwend called the meeting to order at 2:05 pm. Participating remotely were Water Board Members Denver Perkins, Mike Duncan, Kyle Bailey, Arne Hultquist, and Jeremy Lynch. Water Board Member John Gould was absent. City staff in attendance were Assistant City Manager Carly Castle, City Engineer Chuck Williams, Assistant Engineer Eric Johanson, Public Works Director Levi Jones, and Recorder Sommar Johnson.

**Approval of Minutes: February 12, 2020, March 11, 2020, & April 8, 2020 – Approved**  
**Motion:** Board Member Hultquist moved to accept the minutes as written. Board Vice Chair Lynch seconded the motion.  
**Vote:** The motion passed 6-0 with Board Members Perkins, Duncan, Bailey, Hultquist, Dohrenwend, and Lynch voting aye.

**Board and Staff Reports**  
Board Member Duncan reported that City Council adopted raised water rates at their meeting on June 9. He said options C and E were considered by the Council, and option C was ultimately selected. He stated option C offers slightly lower base water rates which will encourage water conservation.

Assistant Engineer Johanson stated that he is going to retire, and this will be his last Water Board meeting. He said his plans involve more radio hosting with an emphasis on public affairs. Board Member Duncan said he will be missed. Committee Member Bailey thanked him for the hard work over the years. Committee Member Duncan inquired what sticks in the minds of Committee Member Bailey and Johanson after so many years of service. Committee Member Bailey said getting the new sewer plant built was the longest project. Johanson stated the new sewer plant is the pride of the state.

Board Member Duncan reported attending a joint City-County Council meeting where Sewer Superintendent Tejada presented that the sewer plant has more water than anticipated and will require an extra processing stage. He requested an update on that topic. City Engineer Williams stated the readings that Sewer Superintendent Tejada referenced from the effluent meter appeared to be high. Assistant City Manager Castle stated that the readings might be faulty. City Engineer Williams said the faulty meter is the preliminary finding; once the City is 100% sure, there will be a mitigation plan.

Board Member Hultquist asked City Engineer Williams if the engineering department lost personnel. City Engineer Williams stated that Assistant Engineer Johanson’s position will not be filled when he retires. He added that Engineering Associate Charles is on maternity leave. He stated that Assistant Engineer Johanson will be missed, but he is hopeful that Engineering
Associate Charles will return to work.

Board Member Hultquist said there are five grants that are being funded by the Utah Division of Water Quality (DWQ). He said the first grant has section 319 funding for a dog waste initiative and it is about $13,000. He said the second grant is for the Pack Creek Restoration Project and it is fully funded by section 319 with matching funds by NRCS (Natural Resources Conservation Service). He said the Southeastern Utah Health Department received a fully funded grant to help digitize the on-site wastewater database. He added that the Southeastern Utah Health Department applied for $200,000 for a human waste initiative management program; the grant funded $75,000 of the project, so the rest of the funding is still being worked out. He said a $3,000 grant is for funding phase four of the BLM’s work in Mill Creek Canyon to remove Russian Olive trees and continue restoration work. He said the total funding for the five grants is around $200,000-$300,000 this year.

Board Member Duncan reported receiving a letter from Dave Erley in Castle Valley requesting a meeting to discuss concerns about the upcoming groundwater management plan process. He reported attending a meeting with Erley and Jeff Adams with the takeaway to look closely at San Juan Spanish Valley Special Service District plan for monitoring well number one. He stated Adams shared a report and several other documents. He said the report for monitoring well number one was sparse and did not provide confidence that it accurately measured the lack or presence of well drawdown in that area. He said it was suggested to build a better relationship with Utah Division of Water Rights Southeastern Regional Engineer Marc Stilson. Assistant Engineer Johanson inquired if there have been efforts to move towards a regional development group. Assistant City Manager Castle said a group has been formed per the interlocal agreement from the new sewer plant. She said the group will meet quarterly for information sharing among the staff of the different agencies.

Board Member Hultquist reported attending a MOPS meeting with a discussion regarding groundwater in section 4 and section 5. He stated the next meeting will be on July 15 at the Spanish Trail Arena and Stilson will present a groundwater monitoring plan. He said the meeting will be from 1 PM-3 PM, and Stilson’s presentation will be from 3 PM-4 PM. He said the meeting cannot take place in the conference room, because it is not possible to maintain social distancing for 25 people in that space. Board Chair Dohrenwend suggested Star Hall as a venue because the bleachers in the arena are not as comfortable. Board Member Hultquist agreed that Star Hall is a better idea for a three-hour meeting.

**Discussion of In-Person Vs. Virtual Meetings**

Board Chair Dohrenwend said City Council will be meeting in-person soon, and the Water Board needs to discuss what meetings will look like in the future. She stated that she assists a person in the high-risk category, so she is uncomfortable being in tight quarters with people at this time. She added that the meetings which include both virtual and in-person groups are horrible.

Assistant City Manager Castle stated the City is operating under the governor-issued emergency order allowing meetings to take place without an anchor location. She said that, once the executive order goes away, an anchor location and a quorum will be required. She said it is unsure when the order will be removed, and it might not happen this year.

Board Vice Chair Lynch stated that he is working from home for the rest of the year except for field work. He said the best thing is to stay out of closed air spaces at this point. Board Member Duncan said the colored stages are political decisions instead of health decisions. Board Member
Perkins said he could attend in-person meetings if everyone wore masks and adhered to social distancing. Board Member Hultquist stated that he had three operations in the last three months and cannot afford to get sick. He said the virtual meetings work for now, but he will attend in-person meetings when they occur.

Assistant City Manager Castle said City Council will return to in-person meetings when the governor’s order expires or ends. She said the City is looking at safety options when a quorum is present. She agreed that meetings are dysfunctional when they are part virtual and part in-person. She said that, whatever is decided for in-person Council meetings will be applicable for Water Board meetings as well. Board Member Hultquist inquired about taking temperatures prior to in-person meetings. Assistant City Manager Castle stated that City staff members must record their temperatures at the start of each workday. She said temperatures could be taken for Board members, but she is unsure if that would apply to the general public.

Board Chair Dohrenwend stated the July meeting will be virtual.

**Update on Overnight Accommodations Progress**
Assistant City Manager Castle said the last Water Board meeting in April discussed water conservation and water resource management principles regarding overnight accommodations. She stated that she wants to keep the Board informed and updated, and there has been no new development since the last meeting. She said this topic is on the back burner for City Council for now.

**Water Rates Update**
City Engineer Williams provided an update from the City Council decision last night. He shared a list of culinary water projects that was developed as part of the water distribution master plan. He said it has a total of $15 million dollars’ worth of projects. He said the options for funding the project list are called alternatives one through five. He said City Council had a workshop and a Council meeting to discuss the alternatives. He said, after those meetings, it became clear that the alternatives were too much of an increase in water rates considering the economic situation currently. He reported meeting with Public Works Director Jones to reprioritize the project list for the necessary upgrades to make the system secure and optimized. He stated the reprioritized list will need about 55% of the original budget or $7,578,188. He said a new well and storage tank are on the reprioritized list. He said the storage tank cost is only 50% of the actual cost, but he is hopeful that the other half can be funded by the drinking water board. He said the Mill Creek Drive project is fully designed and will replace the old failing part of the system. He said the other projects that remained on the list will assist with fire flows. He said the final item on the list is to optimize and secure the existing facilities. He said the City needs an interconnect with GWSSA. He stated that there used to be one, but it is broken. He said the well houses need upgraded and secured as well. He said new options were created called options A-C. He said Councilmember Jones came up with another option called option E. He said option C will increase the base rate by $3 and then 5% per year thereafter. He said option E would increase the base rate to $13.50 next year and then $17 the following year. He said another change is that the first 3,000 gallons of water is free which is more than the previous 2,000 gallons. He said this provides a reward for people who conserve water. He stated the commercial base rates and usage rates have increased between 50%-70%, because this is the group of people that uses more water. He stated that people who use more water require a larger system for their needs, so it is fair to charge them more for the service. He said the City will obtain a bond for $6 million this coming year and another bond in 2022 for about $2.5 million to fund the required projects. He shared a chart from Finance Director York which provided examples of the changes to the water rates based on usage. He showed a comparison of residential water rates for 15 similar Utah
cities. He said this chart shows that the rate increase for Moab is still a good value.

Board Member Hultquist inquired if another well is going to be drilled. He said it will provide a backup if one of the current wells goes down. City Engineer Williams said the plan is to have some redundancy. He said there are two wells and four springs, and he is concerned if the springs become less reliable in the future. Board Member Hultquist said the line connection to GWSSA has been recommended several times and he is happy that it is going to happen. He said the City can sell GWSSA leftover spring money in the wintertime to help them avoid pumping, and it will save some of the Glen Canyon aquifer water. City Engineer Williams said the project still needs proposed to City Council and GWSSA, but it is something that will be discussed and recommended. Board Chair Dohrenwend inquired if the Water Board could assist with a recommendation to City Council. City Engineer Williams said not yet, because he needs to find out about bonding timing first.

Board Member Hultquist inquired if the springs are being monitored 24/7 for water coming from them. He said there has been discussion regarding installing monitoring at the far Northwest end of the valley. He said neither of the springs he is referring to have a total flow measurement. City Engineer Williams said the City is in the final draft review of phase three of Ken Kolm’s work which includes a monitoring plan. Board Member Hultquist said those items are not included in the project list. City Engineer Williams said the project to optimize and secure existing facilities includes some of those items. Board Member Hultquist suggested a grant for the devices to measure those springs. He said the City would be responsible to maintain and read those monitoring instruments. City Engineer Williams said Public Works Director Jones and himself would be supportive of that. He said he suspected Council would support it as well. He said a City employee goes to the wells and springs every day to ensure that they are operating, so it would not require more manpower to read and maintain a monitoring system.

Board Member Hultquist asked to look at the water rate options again. He said he is pleased that the residential base rates are lower. He agreed with the higher usage rates for commercial customers. He said most of the projects on the list must be accomplished. City Engineer Williams said upgrading to 8” lines will increase the flow, because some areas only have 4” lines currently. He stated there are other projects that could be done, but this is a good start. He said he is happy the Council approved it.

**Water Conservation Plan Update**

Board Chair Dohrenwend stated the presentation at the last meeting will be reviewed to answer some of the questions regarding what changes need to be focused on. She inquired if anything needs improvement on the table of contents. Board Member Duncan asked when this document is required to be completed by the Utah State Division of Water Quality. Assistant City Manager Castle said it is required by the Division of Water Resources and it is due next year in August. She said the deadline was extended to stagger the reports, so everyone does not turn them in at the same time.

Board Member Duncan inquired if there are certain criteria that must be discussed in the plan. Board Chair Dohrenwend said it is more beneficial to create a plan that works for Moab and is worth investing time into creating. Assistant City Manager Castle agreed with Board Chair Dohrenwend that it should not be an exercise to meet state requirements; it should produce conservation results for the community.

Board Chair Dohrenwend said the blue items on the table of contents will be completed by City
staff and are required as part of the plan. She said the orange water conservation goals section is what the Water Board should focus on. Board Member Hultquist agreed that the blue section will be provided by City staff. He said it was discussed whether demand projections to build out is the proper category or if it should be in the next 50 years. He also said water use trends and current use per capita consumption is confusing because it is unclear who is using what amount of water. Board Chair Dohrenwend inquired what kind of demand projections would provide clarity. Board Member Hultquist said there are environmental concerns because Moab will have less water in the system due to climate change. Board Chair Dohrenwend said City staff will be asked to prioritize water use trends, current use per capita consumption by residential versus commercial hotel versus industrial. She said it needs determined what metric or demand projections are being measured against. She said climate change needs to be factored into the plan.

Assistant Engineer Johanson said the term build out is nebulous because City Council can decide to build higher instead of outwards. He suggested the conservation plan be harmonized with the water budget that Ken Kolm is working on.

Assistant City Manager Castle reminded the Board that the state has set goals for this region that need met by 2030 which include a 25% reduction. She said the water use profiles need to be known in order to understand what the goal looks like. Board Member Hultquist said a letter was sent to the Division of Water Resources stating that the per capita consumption does not make sense for Moab, because there are 5,000 year-round residents and 3,000 people visit Moab over the weekend. He said Moab needs to cut 17% by 2030, and that amount is what we are expected to lose due to climate change. He said Moab and Spanish Valley have already cut their usage by 15%-20% from the late 1990’s. Board Chair Dohrenwend said it would be beneficial to create a realistic timeline with a goal of conservation.

Assistant City Manager Castle said the Treasurer’s office will have information on the water use profiles. She stated former Finance Director Stenta had been tracking the water use, and it might take some time before Finance Director York has that information compiled. She said City Engineer Williams and Public Works Director Jones will have information on source protection and demand projections. She said a scope of the plan would be provided at the next meeting.

Board Member Duncan inquired who is responsible for the water conservation plan, specifically who will write it and who will review it. Board Chair Dohrenwend said City staff will compile the data for the blue section and the Water Board will review it. She said the orange section will begin with a discussion by Water Board and then be relayed to City staff to draft the sections. Assistant City Manager Castle said there are different conservation practices and members of the Water Board could develop the conservation policy for the plan.

Board Member Perkins expressed concern regarding the Glen Canyon aquifer. He inquired if it would be possible to move towards a regional approach to water conservation. Board Chair Dohrenwend said that could be added to the environmental concerns portion of the plan. Assistant City Manager Castle said the development of a regional governing body could be a recommendation in the conservation goals section. Board Chair Dohrenwend said the Glen Canyon aquifer needs to be added to the conservation practices section of the plan, also. Board Member Duncan said the regional aquifer problem should be discussed with regional groundwater supplies. Assistant Engineer Johanson said the groundwater management goal will have limits on the amount of water that can be used by different entities to ensure that we stay within safe yield. He said, if the water use becomes excessive on the part of one agency/municipality, there will be conformance to the goals of the groundwater management
plan by a regional arrangement. He added that phase three of Ken Kolm’s report involves spring and well protection, and it appears the protection zone will be expanded.

Board Member Duncan inquired what will be included in the environmental concerns portion of the plan. Board Chair Dohrenwend stated she will create a true outline for the plan from today’s meeting notes. She said the groundwater management plan will be included in the water conservation plan.

Board Member Duncan said it would be helpful to know what is required and what is considered guidelines. He said guidelines are widely publicized, educational, and encourage people to adhere to them.

Board Chair Dohrenwend inquired what general topics should be discussed regarding water conservation. Assistant Engineer Johanson said the incentives/rebates/rewards is an opportunity to get some concrete reductions in water use. He said there are subject matter experts in town that could be approached for ideas. Board Chair Dohrenwend said those people could be invited to take part in the Water Board discussions.

Board Member Duncan offered to write an informative document to introduce people to the complicated subject matter. Board Chair Dohrenwend inquired if Board Member Duncan’s proposal will address Board Member Hultquist’s concerns regarding Moab Irrigation Company water for secondary use. Board Member Hultquist agreed and said that a portion of the Moab Irrigation Company water can be pressurized to provide water to more people.

Board Chair Dohrenwend inquired if there were any topics that should be included for discussion by the Water Board. Assistant City Manager Castle suggested that Water Board members come up with at least two ideas to explore for the next meeting.

Assistant Engineer Johanson suggested having incentives for collaborative management of the aquifer. Board Member Perkins said the 2016 water report included the creation of a regional water authority. He offered to research that topic by looking at what other locations have done. Assistant City Manager Castle said the state and City Council will need to be involved to create a water conservancy district. She said the focus of the Water Board is to conserve water supply, not to secure it.

Board Chair Dohrenwend said the next meeting will include draft information from City staff. She said the homework for Water Board is to think of what needs to be included in this document. Assistant City Manager Castle said water trends and demand projection data will be available for the next meeting.

Board Member Perkins said it is important to collaborate with City staff to support the necessary water line improvements.

Board Vice Chair Lynch agreed that conservation should be broken into conservation derived from existing infrastructure improvements and incentivizing new kinds of infrastructure. He said it is easier to support conservation if it is presented as maintaining our fundamental infrastructure. Board Member Hultquist suggested incentivizing water conservation for older homes and proposing ordinances for new developments.

Board Member Hultquist said he forgot to mention one item during board reports: Jessica Pierson was hired by the Utah Division of Water Resources. He stated that Pierson has a history
with water use and conservation, as is knowledgeable of the Moab area.

Assistant Engineer Johanson congratulated Public Works Director Jones on his recent promotion. Water Board members congratulated him as well.

**Adjournment:** Board Chair Dohrenwend adjourned the meeting at 4:03 PM.