

PUBLIC WORKS DEPARTMENT

MAYOR: Lauren McLean | DIRECTOR: Stephan Burgos

MEMO

TO: Mayor and Council

FROM: Steve Burgos, Public Works Director

cc: Courtney Washburn, Chief of Staff

DATE: August 18, 2020

RE: Water Renewal Utility Plan: Public Involvement and Community Expectations

EXECUTIVE SUMMARY

This is the fourth in a series of six memos that Water Renewal Services will deliver to Boise City Council to provide background information on the elements that comprise the Water Renewal Utility Plan (WRUP). City Council action on the recommended plan will be requested throughout the delivery and, importantly, once all background materials have been received and reviewed. The following material summarizes the public involvement efforts and community feedback that informed the Water Renewal Utility Plan.

Public involvement was the backbone of our planning efforts. It was through feedback derived from thousands of conversations with Boise residents, surveys and written input that the vision for the future of our water renewal utility began to take shape. We conducted three rounds of outreach, with each new round building on the previous. By the final round of outreach and feedback gathering, Water Renewal Services was confident that the options for our future—built layer by layer by Boise residents—was reflective of the values and expectations of our community.

INTRODUCTION

As our community has grown, evolved and come to expect more from the services they pay for, we determined a plan for Boise's long-term future could only be successful if it was truly representative of the unique, diverse fabric of our community. We set out to have those conversations over a nearly five year period through a wide variety of channels and build a plan that the community would not only embrace but would own.

Over the course of almost five years, we gathered tens of thousands of pieces of feedback through over 2,700 interactions with our community. This input came from 20 unique opportunities for Boise residents to get involved, have their voices heard, and shape the plan for the future. This information ranged from general impressions and values to highly specific input on potential planning options. We targeted feedback from unique groups of residents, representing diversity in the following demographics:

- Low-income
- Latino
- Members of the refugee community
- Renters
- Homeowners / neighborhoods
- Industry
- Economic Development
- Education
- Brewers
- Environmental groups
- Irrigators
- Healthcare

Each round of outreach was iterative and the findings from the community's feedback gave our team the data and critical narrative that allowed us to ask more specific, actionable and plan-based questions in the next phase.

2016: PHASE ONE

Overview

In 2016, we began gathering the first data on community expectations that would set the foundation for the Water Renewal Utility Plan. The goal of the initial outreach and input gathering was to focus on broad, generalized questions related to the role of Water Renewal Services, satisfaction with services, and visions for the future. This input was gathered through a combination of statistically relevant surveys with residents and in-depth interviews with city leadership, including city council, the mayor's office, the Public Works Commission, and other organizations that utilize water renewal services. In total, we surveyed 400 Boise residents and hosted more than 35 conversations with city and community leadership. The citizens surveyed were selected randomly and represented a wide spread of demographics in the community (Figure 1).

Gender		Owner	Dwelling	Dwelling		Household		Age		Income	
Male	46%	Owner 8	Single Family House	89%	Couple with Children	32%	18-35	11%	\$50,000 or less	8%	
Female	55%	Renter 1	1% Duplex/Triplex	2%	Couple, no Children	35%	36-50	28%	\$50 to 77,000	17%	
		No Answer	4% Apartment	1%	Single with Children	6%	51-64	25%	\$75 - 100,000	17%	
			Condo	3%	Single, no Children	24%	65+	32%	\$100,000+	18%	
			Other	207	No Answer	107	No Answer		No Answer	27%	
			No Answer	2%		4/6	NO VIIZMEI	4%	INO Allower	2/%	

Figure 1. Summary of Phone Survey Respondent Demographics

Phase One Findings

From data collected in the first phase of public outreach, we learned that Boiseans understand the essential role of Water Renewal Services, including collection and treatment of used water and maintenance of the utility, but have a lesser understanding of the specific facilities managed and programs implemented by the utility including the Twenty Mile South Biosolids Application Site and the Dixie Drain Phosphorus Removal Facility.

While Boiseans come from diverse outlooks and perspectives, there are certain trends that emerged from our conversations with residents. The overarching themes we took away from our first round of feedback included:

- Boiseans place a high priority on protecting the environment, particularly the Boise River
- Residents value environmental protection over having the lowest rates
- Innovation is part of Boise's identity
- Water Renewal Services has had a positive impact on water quality

The data and overall trends helped to guide the next phase of outreach, where we were able to explore concepts of future innovations and share the broader story of what Water Renewal Services could do in the future.

2018: PHASE TWO

Overview

Our goal in this phase was to take the priorities we learned from phase one, create an extensive list of potential opportunities to explore as they related to those priorities and bring them to the community for reaction.

These opportunities for future resource management included:

- Direct potable reuse- a system that could treat our used water to such a high level that we could safely consume it
- Energy neutral or even net positive operations (i.e., our facilities generate excess energy for sale on the grid) at our treatment facilities
- Utilizing renewed water for agriculture
- Maintaining our business-as-usual practices
- Continuing to discharge all our treated water into the Boise River

The questions in this phase were designed to gauge the values of our residents and determine how they prioritized reliability, cost, the environment, community resiliency, sustainability and other qualities. We felt that balancing broad, high volume feedback was as important as collecting deeply explored input derived from face-to-face conversations. Our goal was to have a statistically relevant sample of input from Boise residents (approximately 500, based on most recent population numbers) balanced with in-depth feedback collected through longer, personalized conversations.

We paired online surveying with collection of in-depth feedback from a series of focus group participants who would be presented with potential options and provide their reaction to those. Additionally, we hosted two open houses for Boise residents to offer their opinions. These tactics presented numerous options for residents to participate at their level of comfort.

Focus group participants were recruited utilizing neighborhood association newsletters, NextDoor and other social media. In total, we facilitated four separate sessions with a total of 41 participants offering their perspective to advise the Water Renewal Utility Plan. Focus group participants were diverse in age, zip code within Boise, income and race. In order to collect feedback from Boise's next generation, we also hosted a unique focus group with the Mayor's Advisory Council on Youth.

Another integral component of feedback gathering during this phase was an online survey, which was live for four weeks. Survey participants represented a broad cross section of the Boise community from an income perspective (Figure 2.1), but there was notably more participation from homeowners. We noted this disparity and made extra efforts in the next phase (2019) to ensure we were receiving input from renters and groups representing renters. (Figure 2.2). In total, more than 1,000 Boise residents

provided their opinion in the online survey, lending an invaluable body of data to inform the plan.

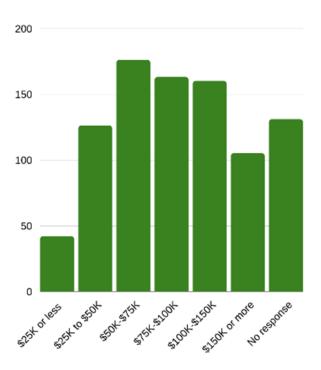


Figure 2.1. Summary of number of survey responses by income category, sorted from highest number of responses to lowest. The figure shows more people in higher income categories responded to this survey

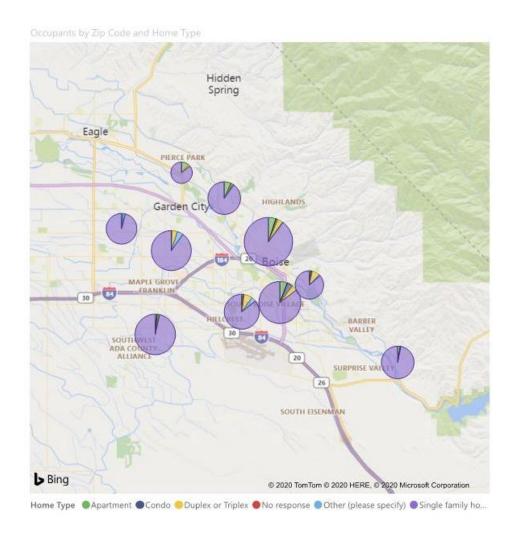


Figure 2.2. Summary of Survey Responses showing Location and Dwelling Type

Phase Two Findings

The second phase of outreach tested many options Water Renewal Services could implement in the future and explored the relative community values, risks and benefits those options represented. The over-arching themes communicated by our community in this phase of work told us that:

- The community identity is fied to the Boise River
- Residents are concerned about the trajectory of the community (citing growth and climate change as a primary concerns)
- Residents are supportive of recycled water
- Residents are interested in renewed water use for many applications

We also learned there is a threshold to the innovation many residents are willing to explore. Residents communicated there is a call for Water Renewal Services to continue be innovative and solve problems for the future, but to do so in a graduated fashion. We learned that there is relatively low support at this time for direct potable reuse,

although there is much higher support for creating a system that could make direct potable reuse an option should our community ever need it in the event of water scarcity or drought. We also learned that there is strong support for the utility operating energy net-neutral, but less support for the utility producing energy that could then be sold on the open market.

Thematically, our residents communicated they expect us to do more than the bare minimum. More specifically, now is the time to take the first significant steps towards a more resilient future that can evolve and flex with variable conditions, expectations and pressures. With this feedback, our team was able to drill even deeper in the next and final phase of outreach, and eliminate some possible options from consideration and begin to analyze numbers, evaluate risk, review potential implementation of the ideas and options that our community suggested they wanted us to pursue.

2019: PHASE THREE

Overview

Staff used the feedback from phase one and phase two community engagement to compile the possible investment options that could be implemented moving forward. These options included mitigating regulatory risks with natural solutions like shading and side channeling of the Boise River, development of greenhouses or farms that could utilize water renewal products (water, biosolids, energy) to grow crops, small hyperlocal neighborhood treatment and recycled water facilities that create redundancy and contribute to system resiliency, storing recycled water in the Treasure Valley Aquifer for use in event of need, providing recycled water for use for industry and, of course, continuing to discharge renewed water to the Boise River as we have been.

This analysis of the options included the risks, the expected investment needed, potential projects it would take to complete, and the community expectations associated with each. Because there is a finite amount of renewed water produced every day (30 million gallons per day), we still needed to better understand how the community prioritized the options and how much renewed water to put where in the community. We needed to better understand which options were critical, what the public wanted to prioritize now and in the future and if there were ideas left to explore.

To facilitate validating the feedback from phase two, as well as prioritizing options with the context of cost and expecting outcomes, we decided to bring together a dedicated group of stakeholders representing varying constituencies of Boise. They provided detailed, well-informed feedback through the final phase. This was necessary due to the complexity of the technical analysis and need to incorporate the feedback already collected.

The Water Renewal Utility Plan Advisory Group was created and comprised of community stakeholders representing a diverse cross-section of our community. Participants were asked to volunteer their time for a 6-month commitment, convening



monthly for two hours. Two focus group participants from phase two were asked to participate as well to create congruency between the outreach efforts. The WRUP Advisory Group participants (Figure 3.1) were:

- 1. Barry Burbank | Lusk Neighborhood Association + Boise State University
- 2. Beth Elroy | Micron
- 3. Brian McDevitt | Southeast Neighborhood Association
- 4. Corey Surber | St. Alphonsus Regional Medical Center
- 5. Dave Sherman | Boise Young Professionals/ T-O Engineers
- 6. Debbie Lombard-Bloom | Collister Neighborhood Association
- 7. Jake Black | Lost Grove Brewing
- 8. Jake Reynolds | Idaho Commerce
- 9. Jennifer Ellis | Livability Ambassador
- 10. Jim Szatkowski | West Valley Neighborhood Association
- 11. JJ Saldana | Idaho Commission on Hispanic Affairs
- 12. Kara Fink | Idaho Office for Refugees
- 13. Karan Tucker | Jannus
- 14. Kendra Kaiser | Boise State University (Post-Doctoral Researcher)
- 15. Kira Finkler | Trout Unlimited
- 16. Lana Weber | Idaho Conservation League
- 17. Marc Banner | Realty Management Associates
- 18. Michelle Doane | Livability Ambassador
- 19. Nabil Kaali | Focus Group Participant
- 20. Paul Arrington | Idaho Water Users
- 21. Ray Stark | Boise Metro Chamber of Commerce
- 22. Tim Lopez | El-Ada Inc. Community Action Partnership
- 23. Tushar Verma | Focus Group Participant



Figure 3.1. Photo of the Advisory Group and city planning team

The goal was to provide the group with detailed, technical information about the potential water renewal solutions as formed by previous public engagement efforts, encourage members to serve as information ambassadors and representatives for their constituents and glean feedback from highly engaged, diverse members of our community.

Throughout the process, members provided perspectives and were instrumental in developing the recommended plan. Although the commitment was long, the Advisory Group had high attendance levels with an average of 81% attendance. This level of dedication was vital to the development of the Water Renewal Utility Plan.

"I will say, I appreciate the opportunity to have civil discourse but not to be afraid to ask some tougher questions. And at least nobody appeared to be outwardly offended. We all worked through this thing and thought about what we might not have considered. I appreciated that opportunity."

Barry Burbank
Boise State University | Lusk Neighborhood Association



Like in phase two, we also deployed a second broad-reaching, community-wide online survey. This method was highly effective in gathering higher volumes of feedback and contributing to public education about the forthcoming plan.

Because surveys are self-selecting, the City of Boise utilized a number of other outreach tactics in order to collect a robust and statistically relevant amount of stakeholder feedback (500, based on most recent population numbers). The survey was marketed utilizing the utility bill insert, digital newsletter, emails to neighborhood associations, social media and flyers in Race to Robie Creek packets. Additionally, we prioritized two community booths in order to increase face-to-face interaction with the public in order to answer questions and encourage participation in the survey. These events were the Boise Farmer's Market, where local media featured the public involvement efforts, and the EggsTravaganza at ZooBoise.

Survey respondents were demographically widely represented, with a range of ages, zip codes and genders making up the data set. Another successful survey more than doubled our feedback collection goal with more than 1,100 Boise residents opting to take the online survey. The high involvement from the community paired with the indepth perspective provided by the Water Renewal Utility Plan Advisory Group provided a well-rounded and comprehensive body of data for our final phase of broad community outreach (Figures 3.2 and 3.3).

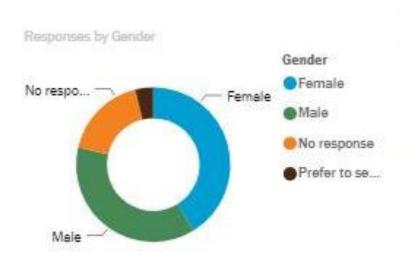


Figure 3.2. Summary of Survey Responses by Gender

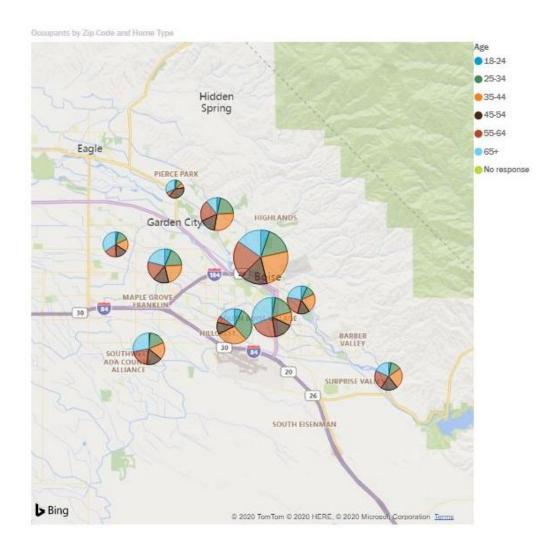


Figure 3.3. Summary of Survey Responses Showing Location and Age Demographics

Phase Three Findings

The final phase of public outreach was centrally focused on Boiseans' priorities once risks, benefits, expected outcomes and anticipated investment numbers were introduced and could be weighed side by side. Once the public was able to see more comprehensive versions of the plan they'd helped to develop, we were able to better understand the direction Boiseans expected Water Renewal Services to take as we looked to the future.



We learned from our third phase of outreach and feedback that:

- There is a reiterated sense of urgency, particularly related to growth and climate change
- Boiseans feel that we are not currently maximizing the environmental benefit of water recycling and they expect more
- Current approach to water renewal has been successful, but changing conditions will demand a different approach
- Residents want to protect the uses of the Boise River, including maintaining some flow to Boise River, while pursuing/ testing multiple recycled water options

Thematically, our residents communicated repeatedly that they would support projects that prioritized the river. They demonstrated a willingness to pay for options that promote river enhancement, and they were specifically supportive of projects that would both enhance the river and help the utility meet increasing regulatory requirements with natural solutions. Boise residents, overall, were very supportive of recycled water implementation and diversifying the application of recycled water. Interestingly, we also heard strong interest for system redundancy in the event of emergency or disaster. Of the options considered in this phase, Boiseans were less supportive of large-scale food production at this time. While there is some interest in keeping the option open in the future, input received indicated that it may not be cost effective and would not have a strong return on investment. However, there was greater support for smaller-scale greenhouse options.

The plans shown in the pie charts below depict various approaches to managing our renewed water. Each color represents a different application for our renewed water. Interestingly, feedback from the WRUP Advisory Group indicated that a varied and balanced approach to our utility management was preferred. What this shows is an expectation to change how the water is managed and used and that new methods are expected in the future. The figures below indicate feedback collected from WRUP Advisory Group members before (Figure 3.4) and after (Figure 3.5) cost was introduced. Only the most expensive options were significantly reduced as a priority once cost was introduced.

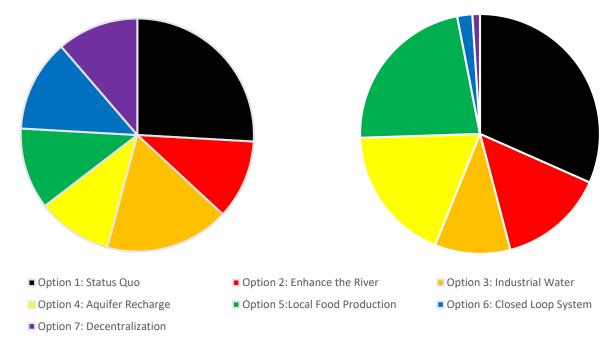


Figure 3.4 (left), Figure 3.5 (right)

In our final phase of outreach, residents validated feedback that we'd heard for years—that the Boise River is critical to our way of life; affordability must be balanced with achieving better outcomes; climate change and growth will impact our future, so we must plan to create a resilient community with concepts like recycled water; and time is of the essence. This phase of feedback also provided our technical team with specific portfolios of options as prioritized by the community that could be technically evaluated for costs, risk and benefits.

CONCLUSION

The approach the City of Boise's Water Renewal Services took to building the Water Renewal Utility Plan was unique in that the public took an active, front-seat role to developing the solutions from the very beginning that will ultimately be in front of Boise City Council as a recommendation for our future. Our residents are invested in our future and they don't just want to be engaged on these issues, they want to help drive them forward. Specifically, our community expects the Water Renewal Utility Plan to address the following:

- Prioritize the health of the Boise River
- Maximize the environmental benefits of water use and recycling
- Decentralize assets to provide system resiliency
- Develop localized solutions that maximize resource recovery
- Create solutions for future generations

