

City & Town Perspectives on Water Management in Utah

Descriptive report of survey findings



Bailey Holdaway & Dr. Courtney Flint

June, 2025



Funding Provided By:



Utah Water Research Laboratory
UtahStateUniversity

Executive Summary

In an effort to better understand the water management practices of municipalities in Utah, surveys were conducted with city and town representatives. These surveys aimed to capture insights across a variety of key topics related to water resource management. The topics covered include:

- Interactions with other entities involved in water management
- Perceptions of risks related to water management
- Challenges faced in water management
- Municipal priorities and decision-making processes
- The perception of municipal voice and representation in water governance
- Time horizons considered in water resource planning
- Perspectives on the Great Salt Lake

Survey methods are described briefly below, followed by a summary of the findings organized by question theme.

The primary purpose of this report is to share high-level findings and key takeaways with those having an interest in water management within Utah.

For further details or inquiries, please contact the authors: Bailey Holdaway (bailey.holdaway@usu.edu) or Dr. Courtney Flint (courtney.flint@usu.edu).

Surveys have been approved by Utah State University's Institutional Review Board under protocol #14530.

Table of Contents

Executive Summary	2
Methods	4
Findings	6
<i>Interactions</i>	7
<i>Risks</i>	8
<i>Priorities & Decisions</i>	9
<i>Time Horizons for Decision-Making</i>	10
<i>Challenges</i>	12
<i>Governance</i>	13
<i>Perspectives on the Great Salt Lake</i>	14
References	17



Methods

Water managers from all incorporated cities and towns in Utah were invited to participate in a survey in early 2025. Out of 254 cities and towns within the state, 63 viable responses were recorded. This equates to about a 25% response rate. The breakdown of responses based on various city attributes can be found in Table 1.

Great Salt Lake Basin (Figure 1)				Non-Great Salt Lake Basin (Figure 2)				
43				20				
Bear River Subbasin	Weber River Subbasin	Jordan River Subbasin	West Desert Subbasin	Sevier Lake Basin	Green River Basin	Upper Colorado Basin	Lower Colorado Basin	San Juan Basin
10	10	23	0	7	5	2	5	1
Rural				Urban				
33				30				
No Water Rights	Small (< 1 cfs or <10 acft)	Mid-Sized (1-10 cfs or 10-100 acft)	Large (10-100 cfs or 100-1,000 acft)	Very Large (>100 cfs or >1,000 acft)				
5	10	13	30	5				

Table 1 Survey responses by category



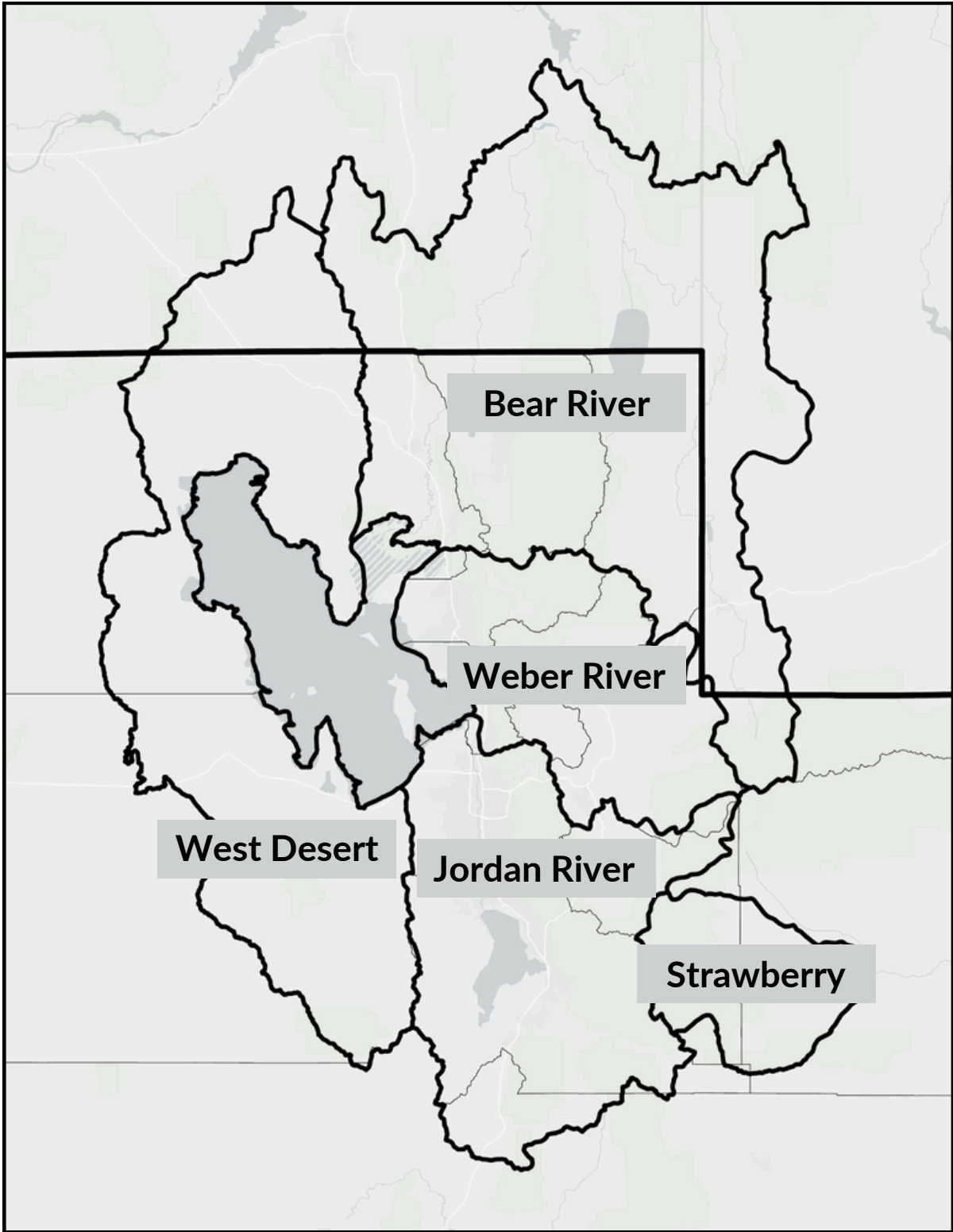


Figure 1. Great Salt Lake Basin and Subbasins

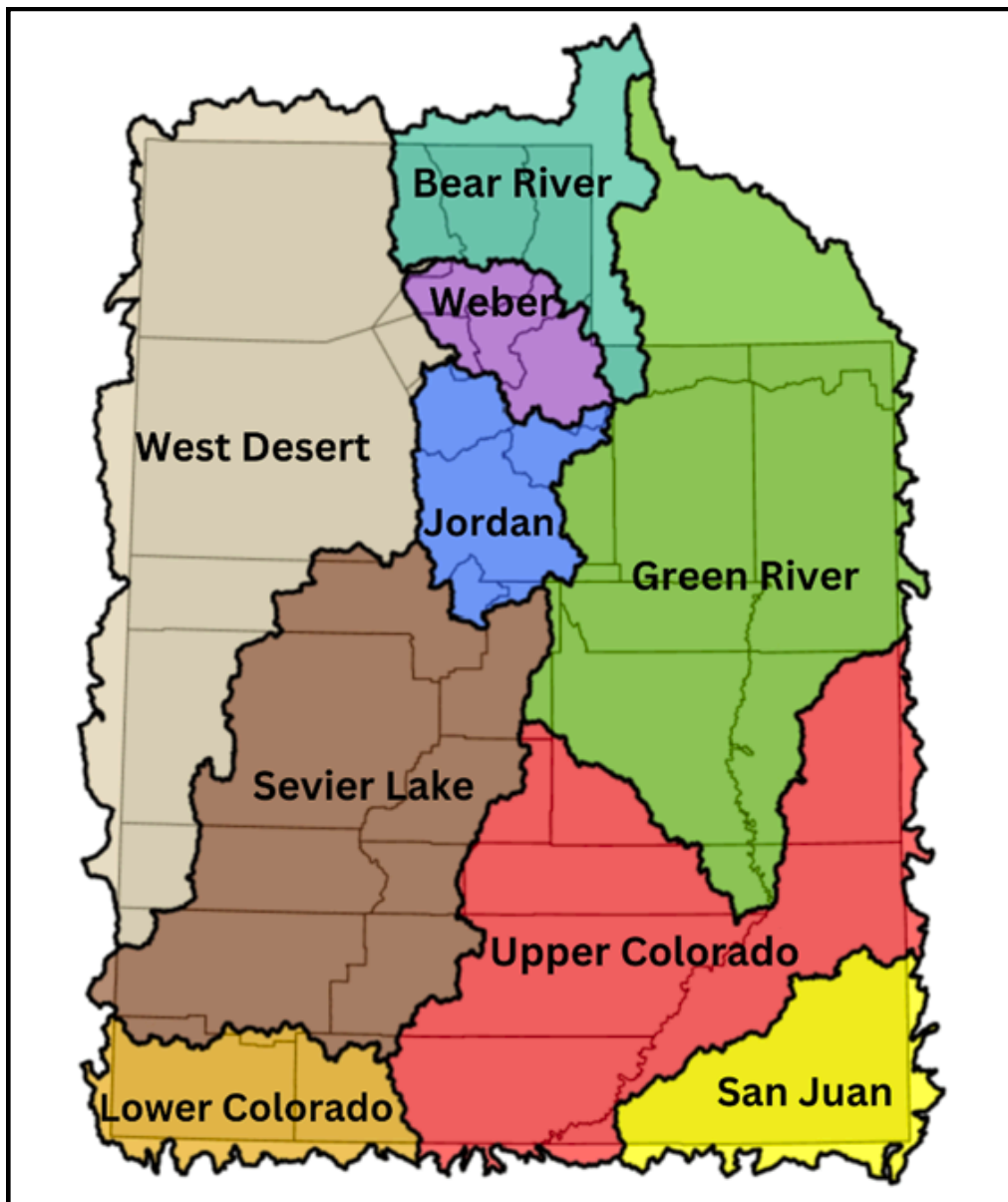


Figure 2. Utah watershed basins

Findings

This project examines the role of municipalities in water management, specifically within the Utah, with a particular focus on how their risk perceptions and decisions impact water management practices.

Findings are organized by topic area. These include interactions, risk perceptions, challenges, priorities, water governance perspectives, and Great Salt Lake perceptions. Additionally, when relevant, differences across basins, subbasins, rural/urban status, and water rights allocations are highlighted.

Section 1. Interactions

Survey participants were asked to rate how often their city or town interacts with various entities. **City/town residents** and **state agencies** were found to be the entities that cities or towns interact with most frequently regarding water management.

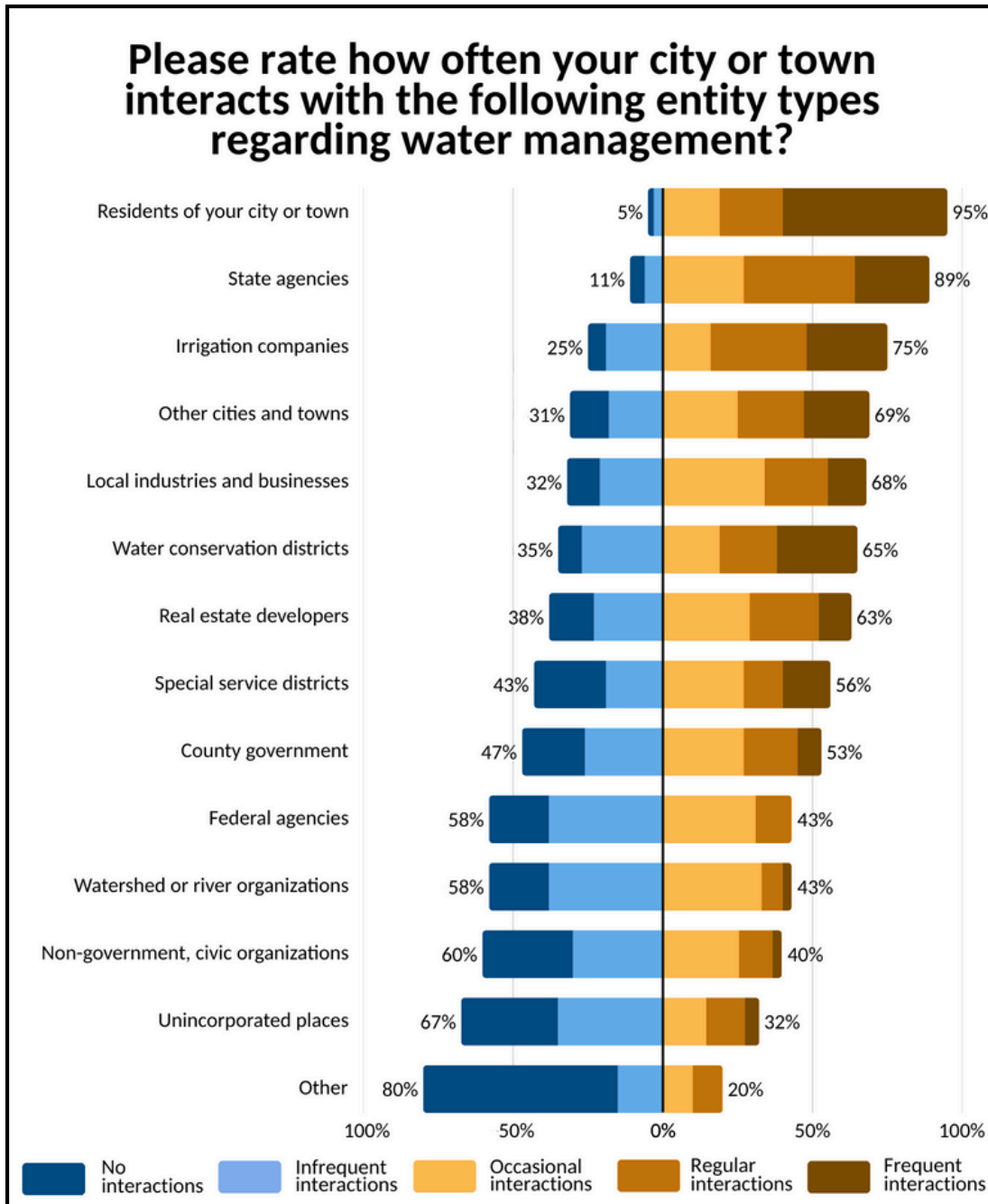


Figure 3. City or town interactions with other entities.

Section 2. Risks

The survey asked participants to assess the level of risk they feel is posed by various risk elements (using a scale of ‘Not a Risk’ to ‘Major Risk’). **Funding, future growth and development, water infrastructure, drought, and public awareness on water management** were top risk factors selected by city and town water managers.

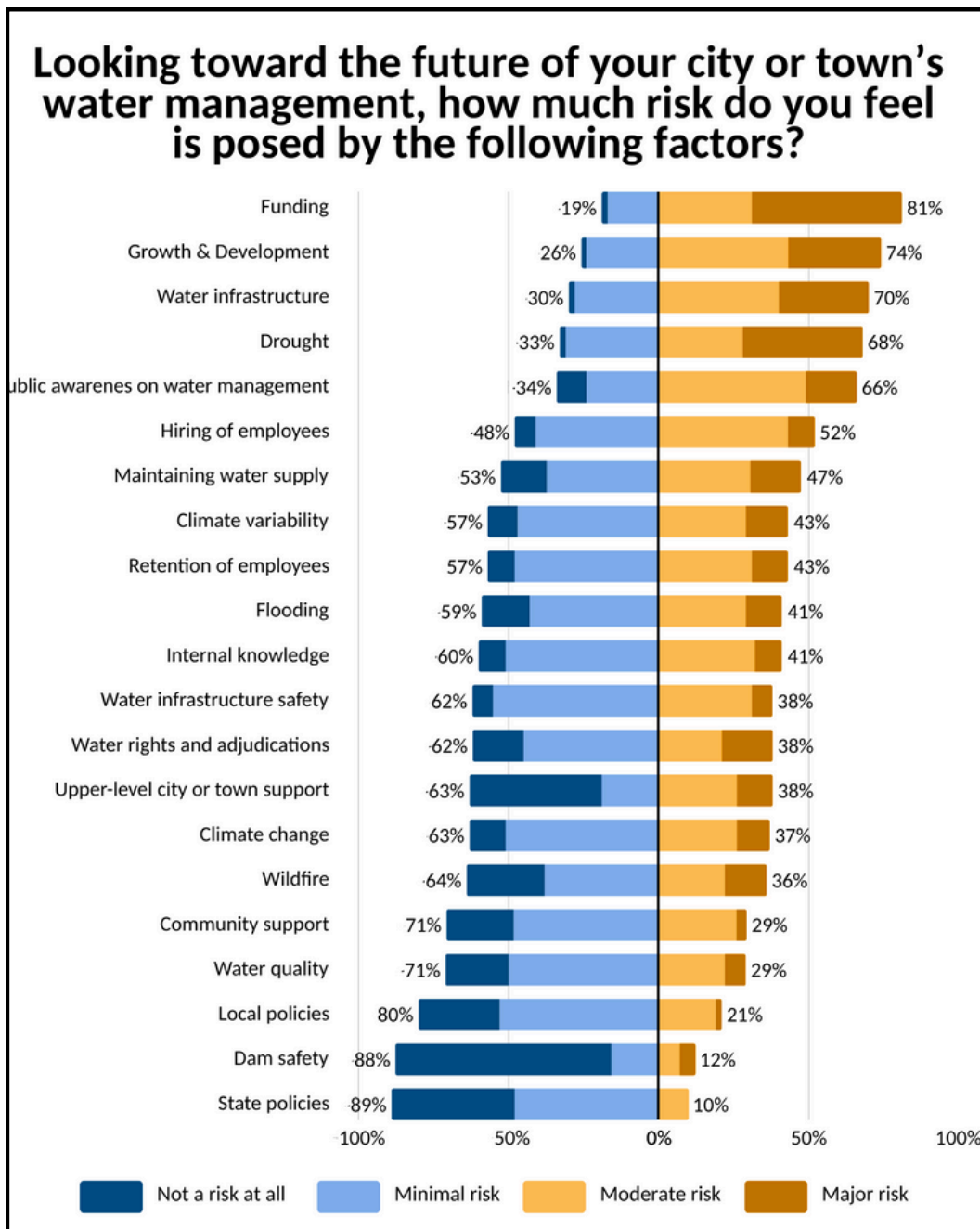


Figure 4. City or town risk perceptions

Section 3. Priorities & Decisions

Survey participants were asked to rate the level of priority for various water management elements. Results show that most cities have a wide range of priority areas focusing on many aspects of water management.

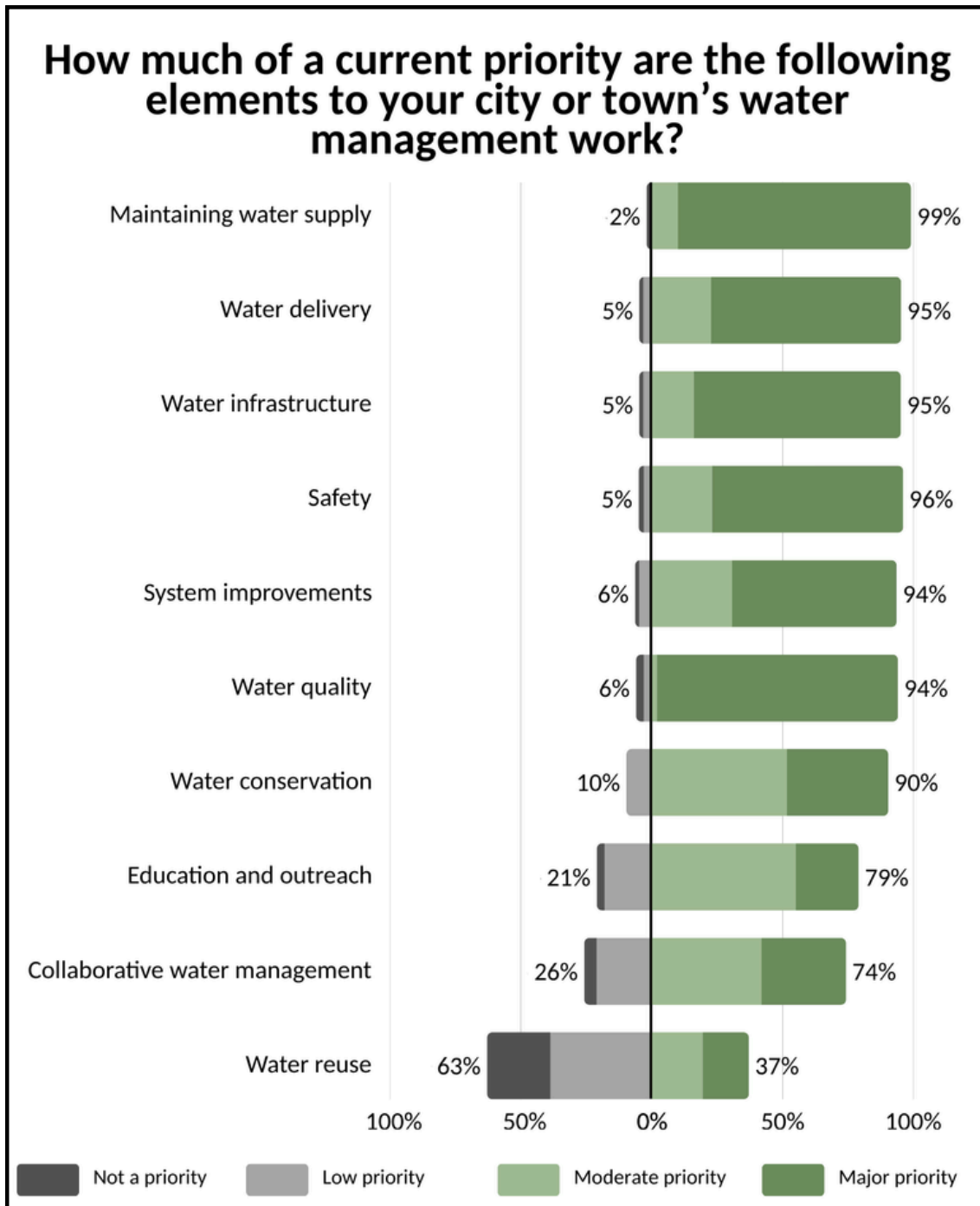


Figure 5. City or town priority areas

Section 4. Time Horizons of Decisions

City representatives were asked about the timescales of their decision-making processes. Survey responses indicated little consensus across cities and towns about planning time horizons. About 50% indicated that planning focuses on five years or less (or not at all), while the other 50% indicated that their city plans at six or more years into the future.

Notably, cities and towns that do not have a water right allocation were found to plan further into the future, showing their water managers appear to be more cognizant of needing to secure water resources well into the future.

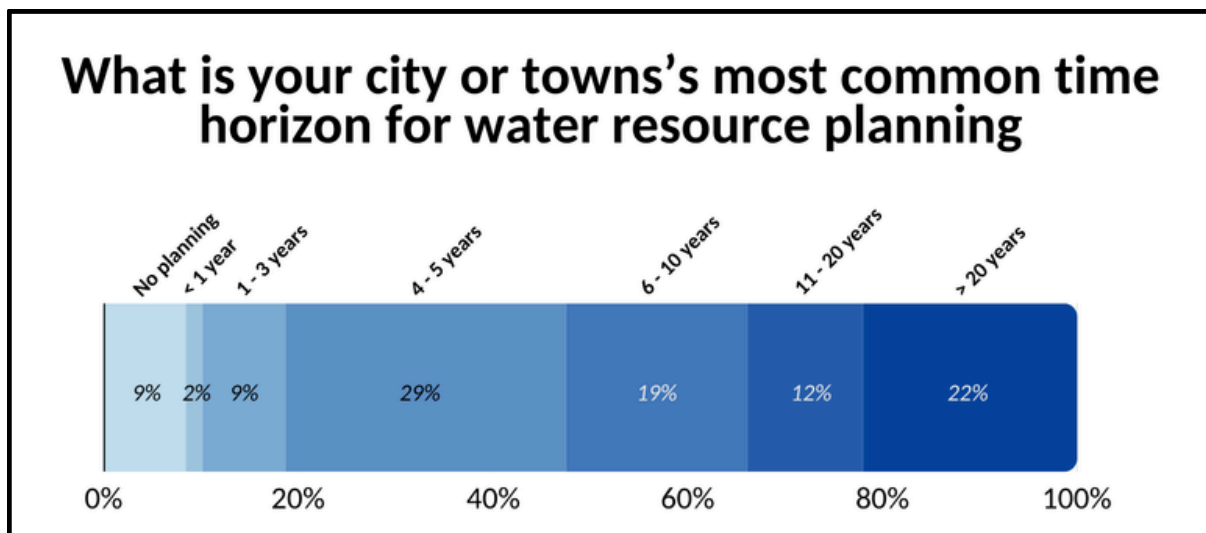


Figure 6. City or town planning time horizons



An additional survey question asked if their city or town's approach to water management has changed in the last five years. Three-quarters of participants said that their municipality's approach has changed at least to some degree in the last five years (Figure 7).

Additionally, respondents had the option to describe in what ways their city or towns approach has changed. Some of these changes include:

- Metering
- Culinary → secondary H2O for outside use
- Water conservation messaging
- Water a higher priority
- System improvements
- Extracting less water and non-irrigated landscapes
- Water tracking tool
- Water conservation messaging
- Tiered water rates
- Data management
- Infrastructure updates
- Water reuse
- Water use accounting
- Trying to be proactive

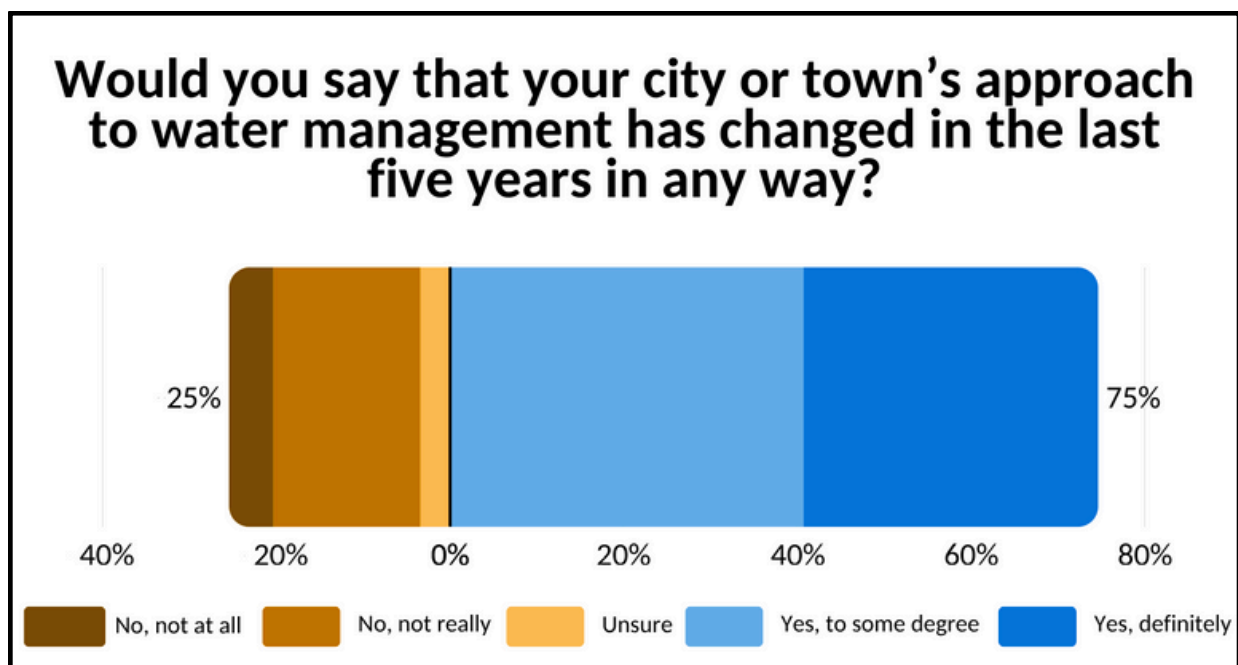


Figure 7. City or town changes to water management



Section 5. Challenges

City and town participants were asked to rate the extent to which various factors presented challenges, using a scale from 'Not a Challenge' to 'Major Challenge'. Survey results indicated that funding, hiring of employees, and structural barriers (water conveyance and distribution infrastructure like canals, pipelines, head gates, etc.) are the most significant challenges to water management efforts.

For rural cities and towns technical (Data, Measurement, Metering, Logistics, etc.) and physical barriers (Geography, Elevation, Buildings, Roads, etc.) were seen as a higher risk than urban. Whereas urban cities and towns, hiring of employees, structural barriers, and employee retention was higher compared to rural cities and towns.

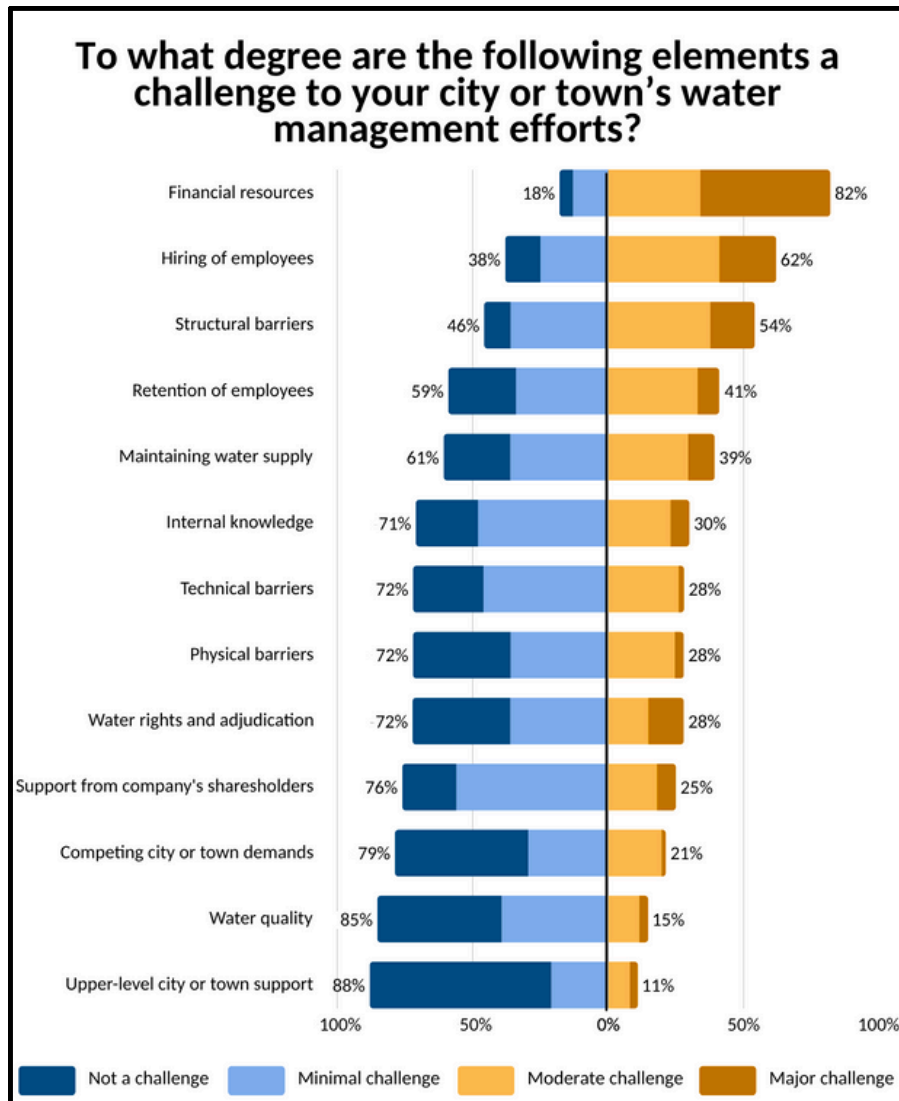


Figure 8. City or town challenges

Section 6. Governance

City and town representatives were asked to rate their level of agreement or disagreement with statements on water governance as shown in Figure 9. Survey results highlighted that only some water managers felt their city or town has a voice, or feel they are represented by others.

Generally, municipal water managers indicated more representation at the basin scale rather than the larger state scale. Additionally, water managers from rural cities and towns that have no water rights feel less represented than more urban cities and towns.

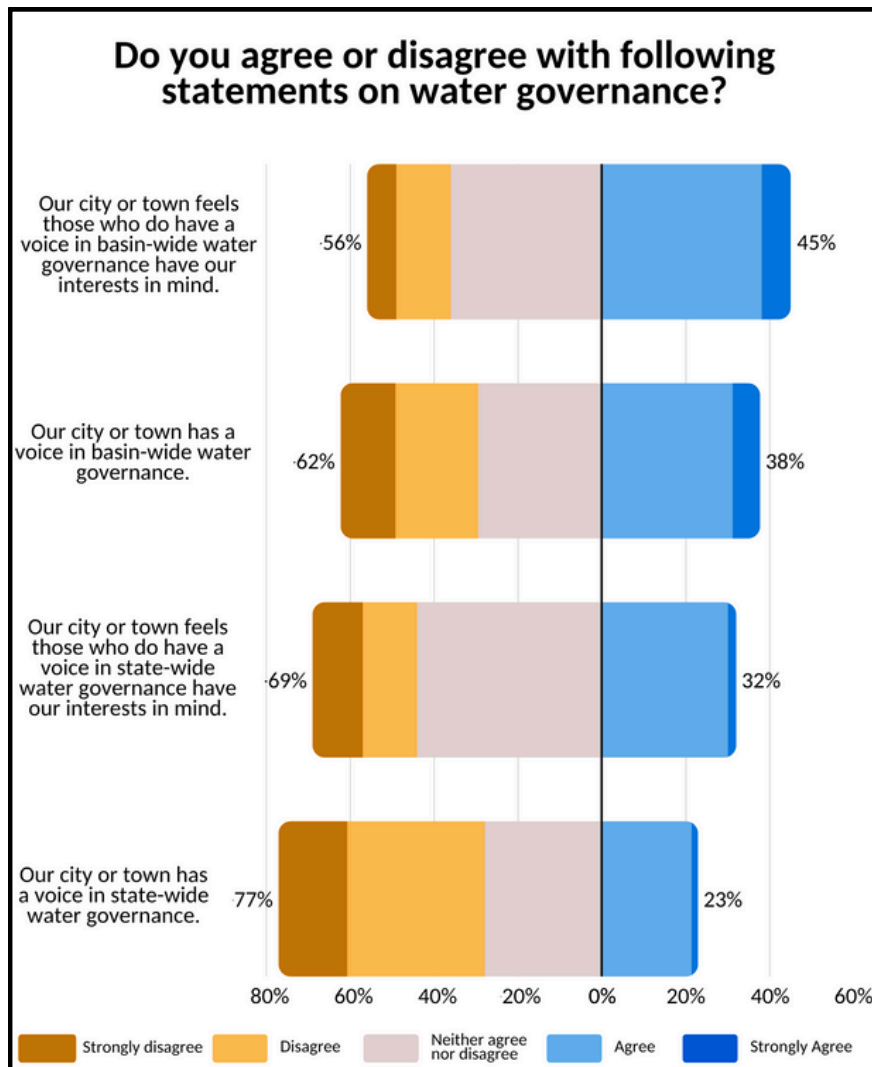


Figure 9. City or town governance perspectives

Section 7. Great Salt Lake Perspectives

City and town water managers were asked to rate the degree to which their municipality considered the Great Salt Lake in relation to their water management practices, using on a scale from 'Never' to 'A Great Deal' (Figure 10). Overall, just under 1/3 of survey participants said they consider the Great Salt Lake at least to some degree.

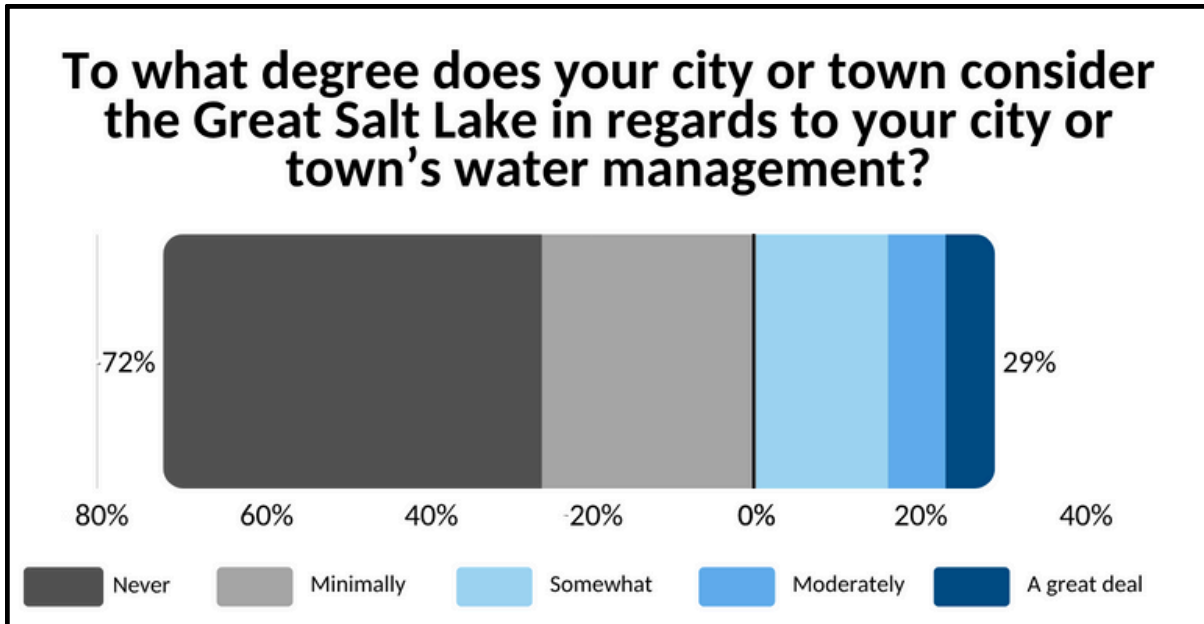


Figure 10. City or town consideration of the Great Salt Lake



Of the municipalities located within the Great Salt Lake, approximately 41% consider the Great Salt Lake at least somewhat in their city or town's water management. This is an increase from the 29% of cities and towns from across the entire state. Note though, that some cities and towns outside of the Great Salt Lake Basin considered the Great Salt Lake a great deal in their water management.

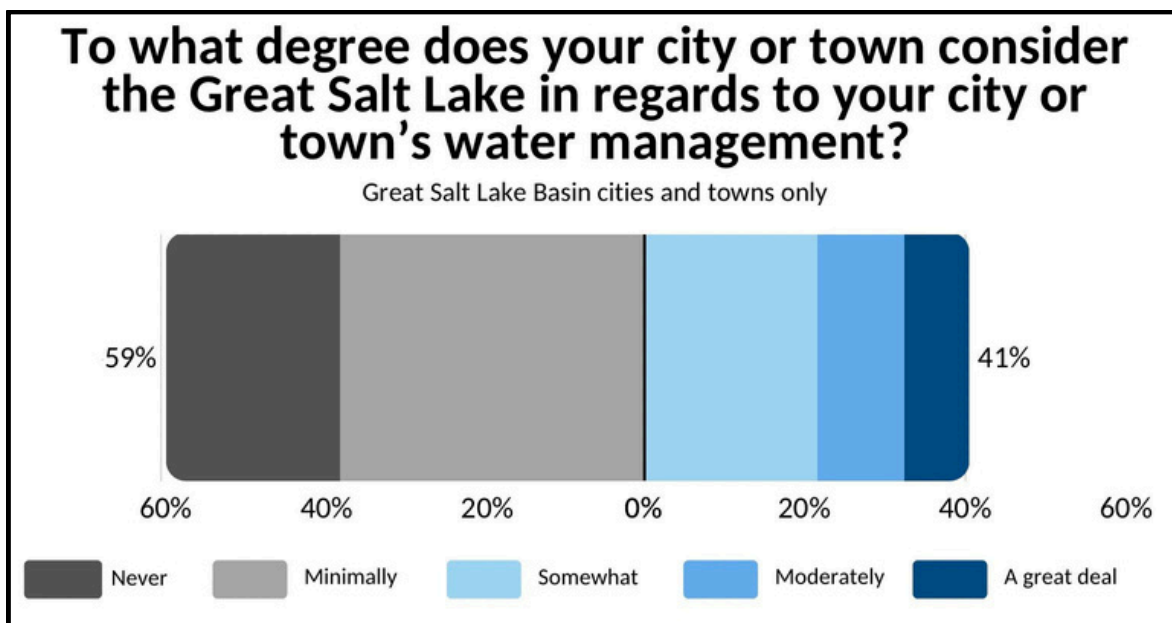


Figure 11. Cities or towns with in the Great Salt Lake Basin that consider the lake in water management.



Additionally, participants were asked to indicate whether three Great Salt Lake scenarios would have an effect on the city or town’s water management strategies. Of the cities and towns within the Great Salt Lake Basin, less than one-third of respondents indicated that any scenario would have an effect on the city or town’s water management strategies.

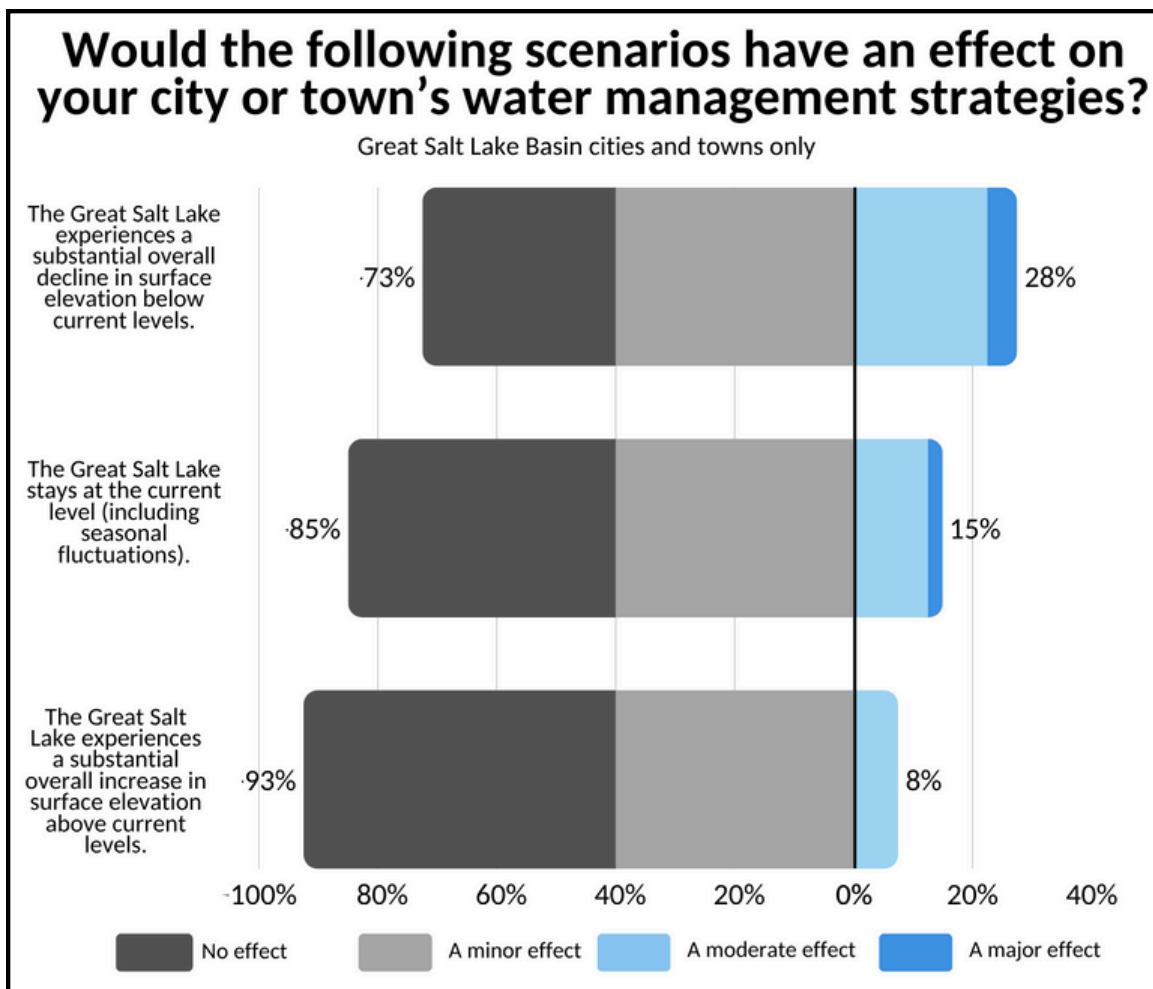


Figure 12. Great Salt Lake scenarios for those cities and towns within the Great Salt Lake Basin



Acknowledgements

This material is based upon work supported by the National Science Foundation under award number 2118329 (I-GUIDE). Any opinions, findings, and conclusions or recommendations expressed in this material are those of the authors and do not necessarily reflect the views of the National Science Foundation.

Additionally, this work has been supported by funds from the Utah Water Research Lab.

Finally, we would like to thank the municipal water managers that participated in this project and those who gave feedback on early versions of the survey. This project would not be possible without these contributions.

References

Picture credits: Canva.com and USU Photoshelter (<https://usu.photoshelter.com>).

