Building Resilience to a Changing Climate:

A Technical Training in Water Sector Utility Decision Support



Day 3 – WUCA Climate Training

July 21, 2022



Looking down onto the Colorado River from Gooseneck Trail in Utah near Canyonlands National Park. *Source: Dave Bassett*

Building Resilience to a Changing Climate:

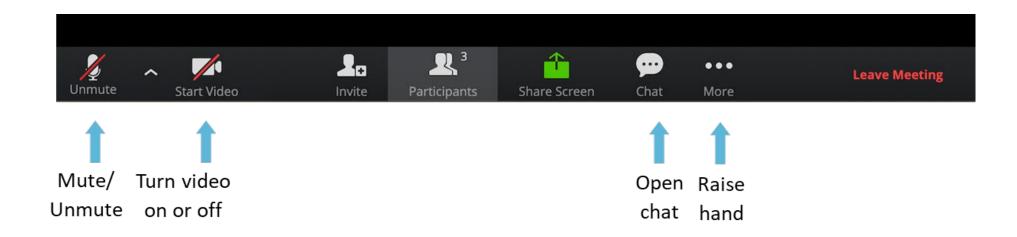
A Technical Training in Water Sector Utility Decision Support



Workshop logistics

Alyssa Hall, Cadmus

Logistics and housekeeping before we get started



Workshop Logistics

Audio

• Please mute yourself during presentations except when called on to ask a question

Video

- Please keep your video off during presentations.
- Please turn your video on during interactive portions.

Recordings

• All presentations will be recorded but breakout group discussions will not be recorded.

Renaming

Please make sure to rename yourself by what you'd like to be called.

This workshop is a collaborative environment. Please be respectful of others and their thoughts/ideas.

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Welcome, Reflections & Agenda Review

Keely Brooks, WUCA, Southern Nevada Water Authority

Day 2 Reflections

- Downscaling and hydrology modeling provide local-scale insights of global scale information, but many methods with various representations of complexity.
- Be extra careful not to confuse high resolution with increased accuracy.
- Currently many downscaling approaches under development for the basin, CMIP5 (BCSD, LOCA, EnGARD, ICAR) & CMIP6 (ICAR).
- Many methods available to incorporate hydrologic uncertainty (resampled historic, GCM-based, blended), BUT the method you pick shifts the risk.
- DMDU helps address challenges with planning under climate change.
- Analyze data to identify which conditions cause policy to be vulnerable across a range of metrics.
- SNWA presented their approach to using multiple scenarios to capture uncertainties.
- Panel reflected on local and basin-wide challenges. Hits keep coming faster & sooner than expected.

Day 3 Agenda Brief Preview

Day 1 (July 19)

- Group exercise: Decision for the decades.
- Focus will be on understanding the capabilities and limitation of climate science.

Day 2 (July 20)

- Expand on capabilities and limitation of climate models, downscaling, and hydrology models.
- Hear from a panel of experts about confronting challenges (especially communication challenges) from decision makers in the water sector.

Day 3 (July 21)

- Understand the different planning frameworks that address deep uncertainty associated with climate change; and
- Learn different communication tools to be able to explain the value and limitations of different planning frameworks to various audiences.