

The Conservation Reserve Tool

COOPERATIVE
CONSERVATION
ALTERNATIVE

Innovative Conservation for Flexible Management of a Thriving River System

The Colorado River Basin faces pressing and evolving challenges to its ecosystems and the diverse community of sovereigns and stakeholders who call it home. The Cooperative Conservation Alternative proposes a **Conservation Reserve** to help advance our shared priorities.



Photo 1. Aerial view of Reflection Canyon, Glen Canyon, Lake Powell, Arizona. Credit: Justin Reznick

COOPERATIVE CONSERVATION PRIORITIES

- **Stabilize storage** and avoid crisis management
- **Ensure mitigation and stewardship** is part of operations
- **Incentivize conservation** and operational flexibility
- **Maintain Cienega, Delta flows** and River connections
- **Call for parallel resilience** building processes

What it is: The Conservation Reserve stores conserved water in Lakes Powell and Mead to optimize operational and ecological benefits until it is delivered to the water user who created it. The conserved water is treated as sitting on top of the regular reservoir storage to avoid interfering with reservoir operations and to maximize the community and ecological benefit of every drop of water saved.



*The Conservation Reserve, a cornerstone of Cooperative Conservation, is an **innovative framework for water conservation and management flexibility that enables adaptation to climate change and uncertain water conditions.** Improving on prior Intentionally Created Surplus (ICS) mechanisms, the Conservation Reserve aims to encourage flexible water conservation to advance water security and ecological benefits Basin-wide.*

Why it is needed: Demand for Colorado River water often exceeds what the River can provide, necessitating innovation and flexibility in managing the water supplies that remain available. Yet existing water conservation programs are limited in scope and application.

While the Intentionally Created Surplus (ICS) program has provided some benefit to Lake Mead over the past 20 years, it has also highlighted challenges that need to be addressed. Currently, ICS “counts” as part of Mead elevations used to inform Powell releases and set Lower Basin shortages, which creates risks of:

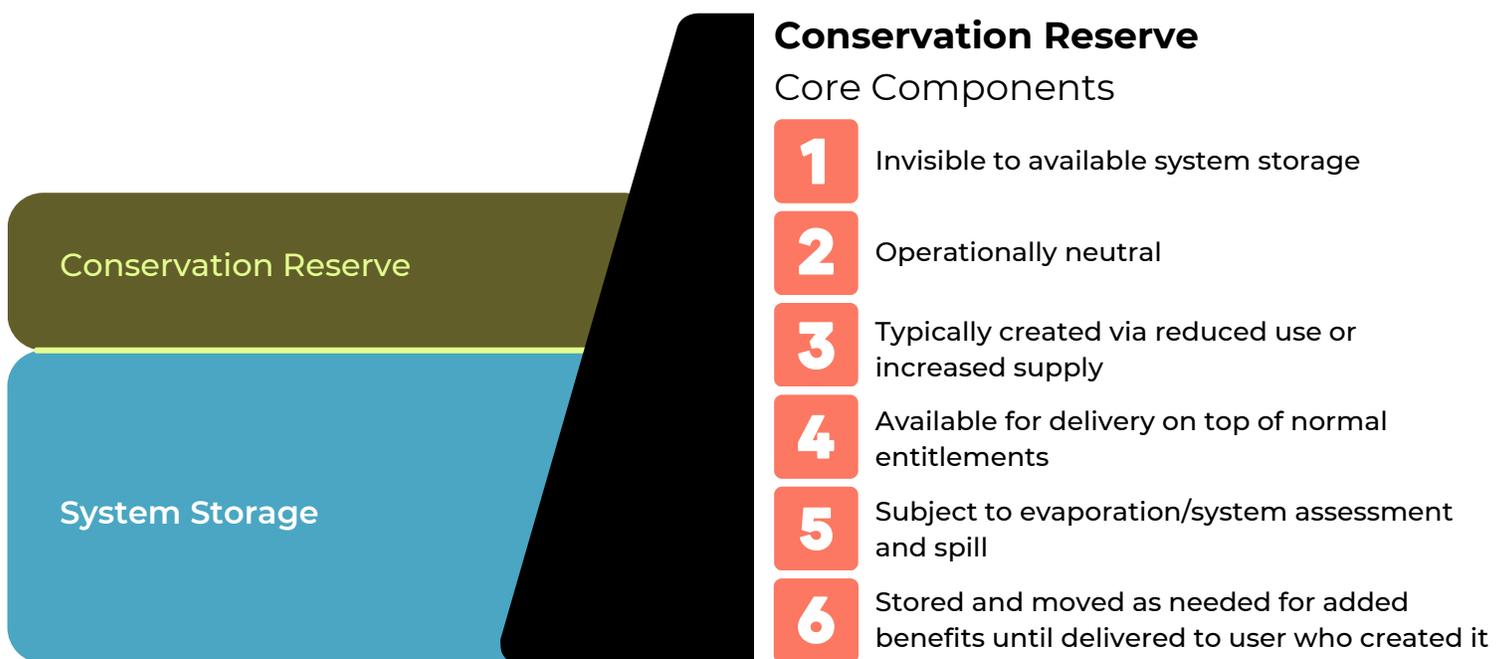
- Propping up Lower Basin water deliveries above what they would otherwise be
- Increasing the amount of water withdrawn from Mead in times of shortage to offset imposed reductions (compromising the effectiveness of shortages in arresting reservoir declines)
- “Gaming the system” by timing the creation and withdrawal of ICS to maximize reservoir releases from Powell/Mead

How it works: The Conservation Reserve would build on existing programs like ICS and others to benefit water users, system operations and the environment. It would provide a separate water savings account that would sit on top of the regular storage at Lakes Powell or Mead and releases from Lake Powell and Lake Mead would be determined as if Conservation Reserve water was not in the reservoirs – something that is sometimes referred to as “operationally neutral top storage.” Water would be added to the Conservation Reserve when water users save water and temporarily store it. Like a savings account, these users could withdraw their saved water at a later time.

Figure 1. Conservation Reserve sits atop System Storage and has six core components.

The Conservation Reserve would initially be open to Lower Basin water users, with the option for Upper Basin, Mexico and Tribal participation if agreed upon in further discussions. The Bureau of Reclamation would manage water added to the Conservation Reserve in collaboration with Basin leadership. It could be stored wherever needed most to protect river health and stabilize the system. For example, Conservation Reserve water could help protect Lake Powell's critical infrastructure or improve Lake Mead's hydropower head. It could also help provide water security and bolster stream flows to protect endangered fish and maintain priceless ecosystems in the iconic Grand Canyon or support a thriving whitewater rafting industry.

By allowing for "top storage" that does not impact regular reservoir operations and encouraging broad participation, the Conservation Reserve is a flexible approach that offers a forward-thinking solution to the Basin's water challenges and carries out our commitment to a resilient Colorado River capable of supporting river health, community needs and ecological sustainability.



Conservation Reserve

Core Components

- 1 Invisible to available system storage
- 2 Operationally neutral
- 3 Typically created via reduced use or increased supply
- 4 Available for delivery on top of normal entitlements
- 5 Subject to evaporation/system assessment and spill
- 6 Stored and moved as needed for added benefits until delivered to user who created it