

**Colorado River Citizens Forum
Imperial Irrigation District Board Room
El Centro, CA
October 25, 2017
*Tentative Meeting Notes**

Board Members in attendance:

Roberta (Bobbi) Stevenson-McDermott, Yuma Natural Resource Conservation District Member, Arizona Association of Conservation Districts Board Member
Brian McNeece, Retired College Professor and Administrator, El Centro, CA
John Hernandez, Executive Director, Our Roots Multi-Cultural Center, Brawley, CA
Gary Knight, Yuma City Councilmember, Yuma, AZ
Juan Leal-Rubio, Senior Planner, Yuma County Department of Development Services
Jim Buster, Southwest Resource Strategies
Glen Freeman, Retired BLM

Alternate:

Bruce Kuhn, Imperial Irrigation District
Jay Simonton, Director of Utilities, City of Yuma, Arizona

USIBWC Staff in attendance:

Anna Morales, Yuma Area Operations Manager
Miles Lampo, Yuma Hydrologic Technician (OA)
Sally Spener, Foreign Affairs Officer

MXIBWC Staff in attendance:

Diana Rosales, Mexicali, BC
Alfredo De La Cerda, Mexicali, BC

Approximately 15 additional members of the public in attendance.

Welcoming and Introduction Remarks:

At 4:00 p.m., the Citizens Forum Co-chair Roberta Stevenson-McDermott convened the meeting by welcoming the group and provided a brief description of the meeting agenda items. Board members and audience attendees were asked to introduce themselves.

Mrs. McDermott introduced herself and turned the meeting over to the first presenter

Presentation One: Minute 323 on US-Mexico Colorado River Cooperation—Sally Spener, International Boundary & Water Commission

Ms. Spener provided a brief background on the 1944 Water Treaty Colorado River

- U.S. to deliver to Mexico a volume of 1.5 million acre-feet per year
- When there are surplus waters, Mexico may receive an additional 200,000 acre-feet
- In extraordinary drought, Mexico is reduced in proportion to U.S.
- U.S. has always met its delivery obligation to Mexico

IBWC Minutes are binding agreements of the IBWC to implement the Treaty. They take effect once approved by both nations' foreign affairs ministries. There are currently 323 Minutes to date.

In 2007, a joint statement by Interior Secretary Kempthorne and Mexican Ambassador Sarukhan kicked off a U.S./Mexico joint cooperative process.

The seven U.S. Basin States and two federal governments asked IBWC to convene a process with stakeholder involvement. In 2010, Minute 317 formalized work groups and the framework for US-Mexico cooperation.

In 2010, Minute 318 was signed allowing Mexico to store water in the U.S. until it could fix earthquake damage to the irrigation infrastructure in the Mexicali Valley following the 2010 Easter earthquake. The stored water could then be delivered to Mexico in subsequent years after repairs were made to the infrastructure.

Minute 319 signed November 20, 2012 is a 5-year agreement through 2017 with seven sections.

- An extension of Minute 318
- High reservoir water sharing
- Low reservoir shortage sharing
- Intentionally Created Mexican Allocation (ICMA)
- Salinity Management
- Water for Environment and ICMA/ICS Exchange Pilot
- Projects

Minute 323 was signed September 21, 2017 and entered into force on September 27, 2017 to extend or replace key elements of Minute 319. Discussions began in 2015 on a new agreement based on Minute 319 and in consideration of evolving basin conditions. The Minute Negotiating Group (MNG) met monthly and domestic consultations were held between binational meetings. Salinity, Projects, Environmental and Hydrology Work Groups were formed to assist the MNG.

A key concept of Minute 323 is to establish Mexico's Water Reserve. This allows Mexico to defer water delivery due to earthquakes, emergencies, or conservation. The water reserved is then available for subsequent delivery to Mexico. This gives Mexico flexibility in water management since it has no storage reservoirs in Mexico. It also boosts Lake Mead elevation to benefit all users.

Mexico had interest in receiving additional water when surplus is available to U.S. users. The Minute provides additional volumes to Mexico of 40,000 -200,000 acre-feet based on 4 high elevation tiers at Lake Mead.

Another part of Minute 323 is shortage sharing. The 1944 Water Treaty does not define extraordinary drought, nor do Minutes 319 and 323. However, in the Minute negotiations an agreed principle was that when one country is in shortage, the other should be in shortage. Based on the Lake Mead shortage tiers in the 2007 U.S. Lower Basin interim guidelines, Mexico agreed to annual reductions of 50,000-125,000 acre-feet; these reductions begin when Lake Mead drops to elevation 1075 feet. Mexico's water stored under Minutes 318 and 319 boosted Lake Mead elevation by 2-3 feet, helping to prevent mandatory cuts in the Lower Basin.

Another part of the Minute is the Binational Water Scarcity Contingency Plan. Based on proposed elements of the U.S. Lower Basin Drought Contingency Plan, it requires water savings earlier to shore up drought-affected reservoirs. It has a commitment to reduce water orders at certain reservoir elevations, but this water could be delivered in the future when reservoirs refill. The Binational Plan would not take effect unless and until the U.S Plan takes effect.

Minute 242 (1973) requires salinity of deliveries to Mexico to be similar to the water quality for U.S. users at Imperial Dam. It was recognized that some of the actions in this Minute could potentially affect salinity of the Colorado River water delivered to Mexico. It was agreed to cooperate to minimize the salinity impacts.

Flow Variability – The Treaty provides for a monthly delivery schedule to Mexico. Mexico users have voiced concerns about the daily flow variability of deliveries. Min. 323 considers potential regulating reservoirs, establishes water order and delivery targets to minimize daily variability.

Environmental considerations were taken into account in Minute 323 and 210,000 acre-feet of water for the environment was identified. The water derives from Mexico but the U.S. is contributing funds to support water conservation projects in Mexico that will generate one-third of the water for the environment. Mexico and nongovernmental organizations would cover the rest.

U.S. funders are providing \$31.5 million dollars for projects in Mexico. In exchange for this investment, the U.S. receive a one-time water benefit, while Mexico derives long-term benefits from the waters conserved. The conserved waters will also be used for the environment in Mexico and system storage. Projects that are being looked into are canal lining, on farm conservation, regulating reservoirs, fallowing, modernization and technical improvements to irrigation districts, system operation improvements and wastewater reuse. There is also a group that will be exploring a binational connection for the All-American Canal.

Benefits to the U.S. of Minutes 319 and 323:

- Provides certainty for water planning, especially in shortage
- Water to U.S. in exchange for investment in Mexico
- Environmental benefits of shared ecosystem
- Storing Mexico's water in U.S. boosts Lake Mead elevation
- Cooperation benefits by all parties

Minute 323 2018-2026

- Work Groups to continue to meet to:
 - Analyze basin conditions and refine joint forecasting
 - Identify means to better control salinity or flow variability in deliveries to Mexico
 - Work on habitat restoration and monitor existing habitat restoration impacts.
 - Consider new projects, monitor projects underway in Mexico and consider additional activities or future new water sources projects such as a potential binational desalination plant in the Sea of Cortez.
- Work on the next agreement for 2027 before Minute 323 expires in 2026

Question and Answer (Q&A):

Q: Where did the funding come from?

A: U.S. funding, the Bureau of Reclamation (Reclamation), Metropolitan Water District, Imperial Irrigation District, Southern Nevada Water Authority, and Central Arizona Water Conservation District.

Q: Is this a new program with Reclamation?

A: No, it is similar to Minute 319.

Q: How could you use the All-American Canal to help Mexico?

A: A lot of details still need to be worked out. It could be a back-up for part of Mexico's delivery system or it could convey water more efficiently.

Q: How much repairs have been made in Mexico since the earthquake?

A: The main Canal network has almost been entirely completed, smaller canals to farm parcels need repairs.

Q: How much water does Mexico still have stored in Lake Mead?

A: A couple hundred thousand acre-feet.

Q: What are the benefits with stored water in this agreement?

A: The agreement allows Mexico to defer deliveries that could not be used and it also increases system storage to keep water in Lake Mead.

Q: Is the \$31.5 million a lump sum?

A: There is \$31.5 million available and there is a Projects Work Group to identify how it will be spent. The Minute specifies a general funding schedule over time.

Q: Is Mexico getting reservoirs?

A: Potential regulating reservoirs are being discussed. Regulating reservoirs hold water for a short period of time. Mexico lacks reservoirs and they are concerned with daily flow variability.

Q: Is the desalting plant location determined?

A: There has been discussion of putting it at Rocky Point but Mexico is still continuing to explore the best location.

Q: Are environmental flows reduced during drought?

A: If there are shortage conditions, environmental water would also be affected.

Q: A Minute changes the 1944 Treaty but that doesn't require Senate approval in the U.S.; is it the same in Mexico?

A: The Minute is signed by the U.S. and Mexican Sections of the International Boundary and Water Commission and approved by the U.S. State Department and Mexico's Secretariat of Foreign Relations. There is consultation with the U.S. Senate Foreign Relations Committee staff but ratification is not required in either country. The new Minute entered into force September 27, 2017.

Q: Negotiations began in 2015, I did not get or see any information until after the fact. Need to incorporate better communication.

A: There have been several Citizen Forums where presentations were provided as well as other public meetings convened by various groups.

Q: When was the last time that Mexico took additional water due to surplus?

A: It has been many years. Even though the U.S. works closely not to over deliver, U.S. deliveries are somewhat over the 1.5 million acre-feet every year.

Q: Is the \$31.5 million composed by different agencies? Did they all contribute the same amount or a different amount?

A: Reclamation is contributing \$16,500 with the rest coming in equal parts from the water agencies mentioned earlier.

Q: What is an extraordinary drought?

A: The treaty does not define extraordinary drought, which leads to uncertainty. Minute 323 helps to address this cooperatively by identifying proactive measures that can be taken to address drought conditions.

Q: Won't that affect the salinity at Morelos Dam? Delivering additional water would harm the U.S.

A: There are provisions in the Minute on how salinity will be calculated so it does not require sending additional water. Salinity is calculated as if the water were delivered at Morelos Dam.

Willie White, Quechan Tribal Council read a statement, expressing concern about the lack of tribal involvement and consultation in developing Minute 323. He hopes moving forward, the tribes are included in the consultation process.

Q: How did the NGO's get involved in the process and the role they played?

A: It dates back to 2000 with Minute No. 306, which opened dialogue and meetings with NGO's. An environmental work group was formed under Minute 319. They provide technical expertise on environmental matters.

Q: Are negotiations open to the public?

A: Because they are part of negotiations with Mexico, they are not public meetings.

Presentation Two: Salton Sea: Air Quality Mitigation Program— Jessica Lovecchio, Environmental Project Manager, Sr., Imperial Irrigation District

Ms. Lovecchio provided an overview of the Quantification Settlement Agreement (QSA) Water Transfer, Salton Sea issues and monitoring efforts.

“The Imperial Irrigation District is a fiscally responsible public agency whose mission it is to provide reliable, efficient and affordably priced water and energy service to the communities it serves.” It provides energy to Imperial Valley and parts of southern Coachella Valley. Water is delivered through 148 miles of main canals and 1,442 miles of laterals, with 1,457 miles of surface drains. Most of this water is received by the All-American Canal

Imperial Irrigation District's (IID) Water Supply & Service Area – permanent crops make up less than 5% of the total acreage; garden crops make up nearly 26% of the total acreage and field crops make up over 69% of total acreage.

- 3,100,000 acre-feet annual Colorado River consumptive use entitlement
- 1,061,637 gross acres within boundaries
- 520,307 total acreage receiving water
- 472,818 total farmable acreage
- 451,015 total acreage in crops

The Salton Sea is a Congressionally designated agricultural sump for IID and Coachella Valley Water District (CVWD). The Sea is almost 50% saltier than the Pacific Ocean. The Sea has had a 6-foot elevation decline since 2003 despite delivery of mitigation water. Without transfers, Sea is estimated at turning hypersaline between 2010 and 2025. With transfers, Sea is estimated to turn hypersaline 1-9 years earlier

QSA Salton Sea Mitigation - In 2003 the Quantification Settlement Agreement was signed transferring 303,000 acre-feet (AF) to San Diego and Coachella Valley Water Districts. In addition to a draft habitat conservation plan to mitigate for the water transfer and IID's water department operation and

maintenance activities, IID began delivering mitigation water to the Salton Sea for a 15-year period. Total mitigation water is up to 800,000 AF with the final year (2017) of delivery expected to be 140,000 AF.

The State Water Resources Control Board (SWRCB) imposed a 15-year (2003-2017) mitigation delivery requirement that was intended to maintain salinity levels for a long enough period of time to study feasibility, determine a restoration alternative and then begin implementation.

Mitigation volumes are proportional to the reduced Salton Sea inflows resulting from the conserved water transferred to San Diego County Water Authority (SDCWA). Mitigation volumes increase as the conversion from fallowing to efficiency-based conservation measures ramps up. 1AF of efficiency-based conservation=1AF of reduced Salton Sea inflow

A Call to Action

- On November 18, 2014, IID, in coordination with Imperial County, submitted a petition to the California State Water Resources Control Board to exercise its continuing authority over the nation's largest agricultural-to-urban water transfer.
- On March 15, 2017, more than two years later and less than 10 months of mitigation flows remaining, IID filed a request for a SWRCB evidentiary hearing to ensure the long-term viability of the QSA water transfers and provide for implementation of a smaller but sustainable restoration plan.

Salton Sea Issues - Increased salinity, water quality, air quality impacts, receding shoreline, potential health and declining habitat value. The salinity is roughly 60 parts per thousand (ppt) – so for every 1000 grams (kilograms) of water in the Salton Sea, roughly 60 grams are salt. Salinity is the measurement of all dissolved salts in a body of water. Pacific Ocean salinity: 35 ppt.

Air Quality Mitigation Requirements: 1) Restrict Access – don't allow individuals to drive on or walk on playa breaking up the crust. 2) Research and Monitor – what is it like before we stop delivering mitigation water and what can we do to mitigate dust impacts: pilot projects 3) Create or Purchase Emission Reduction Credits – buy emission reduction credits when you have exceedance days, however this does not fix the problem. 4) Emissions Reduction at the Salton Sea – implement dust mitigation projects to control emissive areas, install gates to restrict access, post signs restricting access and public education on the benefits of these projects and why you should not drive on the playa.

IID's Salton Sea Air Quality Mitigation Program

- Developed in coordination with Imperial County; a comprehensive, science-based adaptive approach to characterize emissions potential of exposed playa as the Sea recedes and pro-actively implement projects to prevent significant dust emissions
- Pilot testing a range of dust control measures tailored to climate and soil conditions around the Salton Sea
- Identifying measures that can be quickly implemented and scaled to create stable surface and/or prevent the spread of dust emissions on exposed playa

Air Quality Monitoring: There are 6 air monitoring stations set up around the perimeter of the Salton Sea. The air stations measure wind speed, direction, humidity, temperature and pm2.5. Six air stations around the Salton Sea: Torres Martinez, Salton City, Naval Test Base (near border check station), Sonny Bono National Wildlife Refuge (NWR), Bombay Beach and Salton Sea State Recreational Area.

Salton Sea Playa Monitoring: Scientists are also creating vegetation maps and using portable in Situ Wind Erosion Labs to monitor the Salton Sea's condition

Off Lake Monitoring: Surface geologic mapping is helping to determine where dust is generated and impacts to the Sea.

Surface roughening

- Air quality pilot study sites were created to test the effects of surface roughening (determine emissivity at different playa areas)
- They are trying to pro-actively solve the problems on the ground instead of letting it get worse
- Surface roughening turns over large chunks of dirt clods which hold down playa

Vegetation Enhancement

- There is an on-going vegetation enhancement program
- Increasing vegetation catches playa
- They are actively collecting native seed and re-planting
- Drip lines were installed to irrigate the native vegetation
- 1000 acres of pilot projects on the ground as of June 26, 2017

2017-2018 Field Scale Projects

- 250 acres of future surface roughening planned at the Red Hill Bay
- Goal is to have 2000 acres of exposed playa covered
- Identify area for future projects: air station data, PISWERL, surface characteristics
- Soil cores
- EM soil Data
- Established vegetation mapping
- Project design: Surface roughening, vegetation enhancement or both
- Implementation
- Fish and Wildlife Service working with habitat program of 600 acres for shallow shorebird habitat.

Air quality mitigation stations and project videos are on their webpage www.iid.com/airquality

Question and Answer (Q&A):

Q: What is contributing to rising salinity in the Salton Sea?

A: Colorado River has a high salt content, the surrounding agriculture soil has high salinity, there is a lack of fresh water, and evapotranspiration of the sea increases the salinity.

Q: IID water supply expires at the end of the year? Will it be extended?

A: The end of this year is the end of mitigation water. Mitigation water will not be extended.

Q: The mitigation water is no longer needed?

A: The water was to stabilize salinity. We anticipate the state of California to have a restoration plan implemented. This was a 10-year plan, the mitigation water gave the State time to get a plan together.

Q: Is mitigation a result of QSA total funding? How much is left?

A: Yes it is, not sure how much is left. About \$5 Million to mitigation program this year.

Q: What is the current exposure? What is the expected exposure?

A: There is currently about 1 foot of exposed playa, about 17,000 acres total. In the future, estimates suggest approximately 75-90,000 acres of exposed playa.

Q: Who are the air quality meters monitored by? IID?

A: Air quality meters are run by a science-based organization

Q: Are all monitors regulatory monitors?

A: IID monitors are research/Science based

Q: Where is the most emissive playa?

A: On the west side of the sea.

Q: Who owns the exposed playa?

A: IID, Reclamation, Torres Martinez, Salton Sea, Coachella and the State of California.

Q: What other waters go into the Sea?

A: Alamo and New River, 30 drains. There is always water, just not the same amount.

Q: What is the range of soil and crust?

A: High percentage of sand areas have the highest emissivity which is the west side where the Alamo River comes in, there are a lot of barnacles there. Playa isn't emissive for 2-3 years. 6-9 year old exposed playa is the most emissive.

Q: Is the emissive data available to the public?

A: Yes, by written request. We are working on putting a comprehensive webpage.

Q: Is the air monitoring available to the public?

A: Yes, it's online <https://www.arb.ca.gov/aqmis2/aqmis2.php>

Q: Are they planning to put habitat enhancement features on the key areas?

A: Yes, we are identifying habitat spots based on air quality program.

Public Comments: None

Board Discussion and Future Agenda Items: Board to email Anna Morales with suggestions.

Next meeting January 24, 2018 in Yuma County, location to be determined

The meeting adjourned at 5:50pm.

*Meeting notes are tentative and summarize in draft the contents and discussion of Citizens Forum Meetings. While these notes are intended to provide a general overview of Citizens Forum Meetings, they may not necessarily be accurate or complete, and may not be representative of USIBWC policy or positions.