To: The Bureau of Reclamation
crbpost2026@usbr.gov

RE: Comments on the Draft Environmental Impact Statement for Post-2026 Operational Guidelines and Strategies for the Colorado River

March 2, 2026

To the Bureau of Reclamation:

I am writing to submit comments[1] on the Draft Environmental Impact Statement for Post-2026 Operational Guidelines and Strategies for Lake Powell and Lake Mead (DEIS) publicly released by the Bureau of Reclamation (Reclamation or USBR) and the U.S. Department of the Interior (Interior) on January 9, 2026.[2] My comments are focused on issues related to the Salton Sea, and the failure of Reclamation to include in the DEIS the legally mandatory analysis of the cumulative and significant impacts on the Salton Sea, its ecosystem, the fish and wildlife reliant on that ecosystem, the regional environment, the climate, and people throughout the surrounding area—all of which impacts will foreseeably result from implementation of the post-2026 operational guidelines for management of the Colorado River (hereinafter "the Post-2026 Program").[3] I am providing considerable detail in these comments in order to help guide an appropriate analysis of those issues in a revised DEIS for the Post-2026 Program, which I suggest is essential for Interior and Reclamation to prepare expeditiously.

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[1] Please note that I do not represent or speak on behalf of any interested individual, organization, company, or government entity. I submit these comments solely as a concerned citizen, and as someone who has spent many years objectively analyzing the scientific, factual, legal, and policy issues relating to the past, present, and future of the Salton Sea and the Colorado River.

[2] Available at: https://www.usbr.gov/ColoradoRiverBasin/post2026/draft-eis/index.html.

[3] Although Reclamation has primary responsibility for managing the Colorado River, I refer throughout these comments to both Interior and Reclamation to emphasize the role of the Interior Secretary and to emphasize that other agencies in the Department of the Interior in addition to Reclamation have important expertise and responsibilities relevant to Salton Sea issues.

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I. The DEIS fails to satisfy the urgent need for the Post-2026 Program, and does not comply with applicable law; therefore, a revised DEIS is required

The Colorado River, and the roughly 40 million people who depend on its water, are unquestionably teetering at the brink of catastrophe. Reservoirs are already at perilously low levels, and the effects of climate warming on the hydrology of the Colorado River Basin are reducing the river's streamflow to the point that Lake Powell may soon drop to a critical elevation that threatens the ability of Reclamation's infrastructure to safely move water downstream to serve even the basic health and safety needs of more than 25 million people in the United States and Mexico. If that foreseeable emergency scenario materializes, Glen Canyon Dam will face high risk of disastrous structural damage, and Interior and Reclamation will be obliged to drastically reduce allocations of water to the Lower Basin states and Mexico, a situation which will cause major injurious consequences for people across those regions and devastating harm to fish and wildlife.

The DEIS explains that the Post-2026 Program is necessary in large part because:
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> *The 2007 Interim Guidelines have not sufficiently reduced risk:* Based on operational experience since 2007, the current guidelines are not robust enough to manage the system in a way that is sufficiently protective of the resources dependent on the Colorado River. Despite near-continuous drought-response actions in recent years, low-reservoir conditions have persisted, and new infrastructure risks at Glen Canyon Dam have arisen. More robust and adaptive guidelines are needed for the efficient and sustainable management of the major mainstream Colorado River reservoirs and system resources.[4]

In addition, the DEIS explicitly recognizes that the Post-2026 Program must account for the fact that climate warming and associated aridification are adversely affecting the Colorado River Basin's hydrology, and are causing significant and ongoing reductions in Colorado River streamflow that are projected to worsen substantially in the future:

> *Imbalance between water supply and demand will be exacerbated by increasingly likely low-runoff conditions:* The Basin is experiencing increased aridity due to climate variability, and long-term drought and low-runoff conditions are expected in the future. These conditions will exacerbate the now widely recognized imbalance between water supply and demand in the Basin. Robust and flexible guidelines are needed to manage the Colorado River system and its resources under a broad range of potential future hydrologic conditions.[5]

Similarly, the DEIS states that the purposes of the proposed federal action include to "[p]rovide Colorado River water users a greater degree of predictability with respect to annual water availability in future years under anticipated increasing variability, low runoff, and low-reservoir conditions."[6]

Based on the inability of the Colorado River Basin states to reach an agreement among themselves regarding the details of the Post-2026 Program prior to the February 14, 2026 deadline set by Interior and Reclamation, it currently appears likely that Interior and Reclamation will be proceeding with the Basic Coordination alternative presented in the DEIS as the proposed federal action for the Post-2026 Program. Reclamation has stated the Basic Coordination alternative is the only action alternative that the agency has the authority to implement in the absence of agreement among all the Basin states.

However, the Basic Coordination alternative is insufficient to achieve the purposes of the Post-2026 Program because that alternative fails to meet key performance objectives in approximately 30% to 35% of Dry-year scenarios and approximately 40% to 75% of Critically Dry-year scenarios,[7] pursuant to the definitions of "Dry" and "Critically Dry" in the DEIS. In addition, Reclamation's modeling makes clear that none of the other alternatives evaluated in the DEIS—regardless of the severity of the water-use cutbacks they require—properly satisfies the need for the Post-2026 Program and performs well under all reasonably foreseeable hydrological conditions.[8] Reclamation has explicitly recognized that fact by publicly stating, "In Critically Dry periods, all alternatives have unacceptable performance."[9]

In formulating the Post-2026 Program, Interior and Reclamation must consider "the fact that 50% of the individual years of the 21st century (2000-2025) have been Dry or Critically Dry (including 2020, 2021, 2022, 2024, 2025) and only 27% of the years (including 2017, 2019, 2023) have been Moderately Wet or Wet…The *average flow* for the past six years (2020-2025) was 10.8 MAF/year, *less than the median reported*

[4] DEIS, Executive Summary, section ES.1.1, page ES-4.

[5] DEIS, Executive Summary, section ES.1.1, page ES-4.

[6] DEIS, Executive Summary, section ES.1.1, page ES-5.

[7] DEIS, Executive Summary, Figure ES-5.

[8] DEIS, Executive Summary, Figure ES-5; DEIS, Ch. 3, Figures 3-8, 3-10, 3-13, 3-15.

[9] Statement by Carly Jerla, Reclamation EIS Coordinator, at the virtual public meeting on the DEIS, January 29, 2026.

for the Dry category."[10] Moreover, Interior and Reclamation must also account for the fact that scientific studies regarding the future impacts of climate warming on the Colorado River have projected that aridification will continue to cause major additional reductions in streamflow in the coming years. For example, a 2020 study found that by mid-century (2036-2065) Colorado River streamflow could decrease more than 30% in relation to the 1913-2017 mean, and potentially by as much as 40%.[11] Another recent study found that, estimated conservatively, Colorado River streamflow will shrink at least 20% more by mid-century than it has already, and 35% more by the end of the century; and potentially the river's flow could suffer even more significant declines of over 30% by mid-century and 55% by later in the century.[12]

Regardless of whether the Basic Coordination alternative, a different alternative presented in the DEIS, or another alternative not yet released to the public is ultimately adopted as Reclamation's preferred federal action for the Post-2026 Program, it is clear Salton Trough rights holders that are subject to the terms of that program—the Imperial Irrigation District (IID or the District) and the Coachella Valley Water District (CVWD)—will be called upon to reduce their use of the river's water, because such cutbacks will be necessitated by the dire water-shortage crisis affecting the Colorado River.[13] Therefore, **as used in these comments, the phrase "the Proposed Action" encompasses all potential action alternatives for the Post-2026 Program that Interior and Reclamation may adopt and that entail reductions in use of Colorado River water by Salton Trough rights holders, whether or not such action alternatives are presented in the current DEIS.**

It is clearly foreseeable both factually and scientifically that Reclamation's Proposed Action will have cumulative and significant harmful impacts on the Salton Sea, the Salton Sea ecosystem as defined by law,[14] fish and wildlife reliant on the Salton Sea ecosystem (including but not limited to species already designated as endangered and threatened under federal and state law), the regional environment, the climate, and more than half a million people throughout the surrounding area—including Tribes, to whom the federal government owes legally mandatory trust obligations. (When the foregoing impacts are referred to collectively in these comments, the phrase "Salton Sea Impacts" will be used for brevity.) Furthermore, and crucially, many of the injurious Salton Sea Impacts that are very likely to result from the Proposed Action will be devastating and irreversible.

Reclamation and Interior are obligated under the National Environmental Policy Act (NEPA) and other applicable law to fully evaluate the Salton Sea Impacts that are reasonably foreseeable consequences of the Proposed Action, and to identify and implement measures that will serve to avoid, or effectively minimize and fully mitigate, those consequences. Compliance with those obligations is particularly crucial given the context in which the Post-2026 Program will be implemented—involving more than two decades of failures by responsible government agencies to restore the Salton Sea as statutorily mandated, or even to implement legally required mitigation of the harmful consequences of ongoing water transfers and other water-use reduction agreements instigated and approved by Interior and Reclamation. But despite their legal obligations, Interior and Reclamation have completely, summarily, and unjustifiably abdicated their duties in the DEIS, and have explicitly stated that "analysis of impacts on the Salton Sea is not included in this EIS."[15]

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[10] Comments on the DEIS submitted to Reclamation on February 27, 2026 by A.J Castle, J. Fleck, R.E. Kuhn, J.C. Schmidt, K. Sorenson, and K. Tara. Emphasis added.

[11] Milly, P.C.D. and Dunne, K.A. (2020). Colorado River flow dwindles as warming-driven loss of reflective snow energizes evaporation. *Science* 367(6483), 1252-1255, https://doi.org/10.1126/science.aay918.

[12] Udall, B. and Overpeck, J. (2017). The twenty-first century Colorado River hot drought and implications for the future. *Water Resources Research* 53, 2404–2418, https://doi.org/10.1002/2016WR019638.

[13] It is also clear that Mexico, the third Colorado River water user in the Salton Trough, will also be called upon to decrease use of the river's water pursuant to a legal process distinct from the Post-2026 Program.

[14] The Salton Sea ecosystem includes the lake and its lakebed, tributary streams and agricultural drains, associated riparian areas and wetlands, and farm fields in the IID service area. (California Fish & Game Code § 2931(d).)

[15] DEIS, Chapter 3, Section 3.2.7, page 3-22.

The primary focus of the DEIS should have been on evaluating in detail how the included alternatives perform during Dry and Critically Dry periods, as well as on developing and analyzing measures to avoid, or minimize and fully mitigate, the harmful consequences of implementing alternatives that do not perform satisfactorily in Dry and Critically Dry periods. The evaluated harmful consequences should have included the foreseeable, cumulative, and significant injurious impacts on the Salton Sea, its ecosystem, the fish and wildlife reliant on that ecosystem, the regional environment, the climate, and people throughout the Salton Sea area.

Because the necessary analyses were not included in the DEIS, it is necessary for Interior and Reclamation to prepare and issue a revised DEIS. The revised DEIS should present at least one action alternative that will meet all key performance objectives in Dry and Critically Dry years, and is within the existing legal authorities of Interior and Reclamation to implement in the absence of agreement among all Basin states. If the current legal authorities of Interior and Reclamation are not adequate to implement any alternative that will meet key performance objectives in Dry and Critically Dry years, the agencies should publicly explain what additional authorities are needed and should expeditiously obtain them.

Based on the information and analysis presented in the DEIS, along with other pertinent facts and science, for Interior and Reclamation to proceed with any Proposed Action entailing reduced Colorado River water use by Salton Trough rights holders, while neglecting to fully analyze the associated Salton Sea Impacts and failing to commit to avoiding, or effectively minimizing and fully mitigating, those impacts would be an arbitrary and capricious abuse of discretion that would violate applicable law, endanger the health and even the lives of more than half a million people including members of federally recognized Tribes, damage the environment and the climate, and jeopardize the continued survival of fish and wildlife populations, including species that are already at risk of extinction.

II. Crucial context: The worsening Salton Sea crisis and the failure to remedy it

It is not possible to analyze appropriately the significance of the Proposed Action's Salton Sea Impacts without fully accounting for the context in which the Proposed Action will occur. Most importantly, Reclamation is legally required to consider the nature and severity of the environmental, ecological, and public-health effects of previous and ongoing reductions in the inflow to the Salton Sea, the additive impacts of the new decreases, and the potential synergistically harmful interactions of the additional cutbacks with the existing ones. Reclamation has not properly accounted for these issues in the DEIS, and the agency's failure to do so violates federal law.

A fundamental misconception about the Salton Sea that insidiously affects much discussion of the lake's future is the widespread but erroneous belief that the lake is unnatural. This notion that the Salton Sea is a man-made body of water created accidentally at the beginning of the 20th century is both factually and scientifically wrong. Furthermore, the lake does not owe its existence to 20th-century Colorado River infrastructure, even though it is now dependent upon Colorado River wastewater. As I explained in a peer-reviewed scientific study published in 2020,[16] when the Colorado River flooded into the Salton Basin in 1905-1907, enhancing the size of a lake containing Colorado River water that already existed there,[17] the river was simply behaving in

[16] Ross, J.E. (2020). Formation of California's Salton Sea in 1905-07 was not "accidental." In: Miller, D.M. (Ed.), *Proceedings of the 2020 Desert Research Symposium*, Desert Symposium, Inc., pp. 217-230. (Available open-access online at: https://www.researchgate.net/publication/340038533_Formation_of_California's_Salton_Sea_in_1905-07_was_not_accidental.)

[17] See, e.g., Bailey, G. E. (1902). *The Saline Deposits of California*. California State Mining Bureau Bulletin No. 24. 187 pages. The frontispiece relief map of this 1902 book depicts the large lake that was present in the Salton Basin prior to the 1905-1907 flooding. The text on pages 122-124 discusses that lake and the salt harvesting operations adjacent to it, and a photograph at the top of page 123 shows the lake in the distance and the salt deposits in the foreground. Note that the lake was already known as the "Salton Sea" prior to the 1905-1907 flooding. A large body of evidence (some of which is summarized in Ross, 2020 supra) contradicts the common but misguided notion that the 1905-1907 floodwaters flowed into a dry basin that had not held a lake since "ancient" times.

the same manner it had for millions of years. Geologic evidence establishes that the northern Salton Trough, containing the Salton Basin in which the Salton Sea lies, became a natural part of the Colorado River's hydrologic system about five million years ago when the river first arrived at the Gulf of California.[18] As the river meandered throughout its delta region, which gradually became uniquely bifurcated into northern and southern lobes as the result of tectonic processes,[19] its waters flowed into the Salton Basin and sustained vast estuarine, deltaic, lacustrine, and other aquatic and wetland ecosystems. That important hydrologic connection between the Colorado River and the Salton Basin continued to exist for millions of years until the river was intentionally prevented from flowing into the Salton Basin anymore in the 20th century.

The Colorado River's natural hydrologic regime across its delta region, and the rich aquatic and wetland ecosystems in the Salton Basin—including enormous lakes—that the river created and supported, were abruptly altered forever when the river's route into the northern Salton Trough was deliberately and permanently blocked. Preventing the Colorado River from flowing naturally into the Salton Basin as it had done for millions of years—and as it continued to do on an ongoing basis through the early 20th century—was a primary motivating factor for the Boulder Canyon Project Act and the construction of Hoover Dam and other key infrastructure on the river.[20] That 20th-century water-management infrastructure enabled the Colorado River Basin states to develop in the manner they have during the past one-hundred years. But fully controlling the Colorado River, permanently severing its natural connection with the Salton Basin, and exhaustively exploiting the river's water also sealed the fate of the Salton Sea; the demise of the lake and the collapse of its ecosystem were assured without additional human intervention.

Ever since full control of the Colorado River was attained using Reclamation's infrastructure, the Salton Sea and its essential ecosystem have been reliant on very large quantities of Colorado River wastewater flowing into the central Salton Basin as a result of the use of the river's water by IID, CVWD, and Mexico. Because IID's Colorado River water entitlement is by far the largest among those users as a result of the District's very senior water rights, IID's use of the river's water is essential for sustaining the Salton Sea. Approximately 85% of the Salton Sea's inflow is wastewater that derives directly from Imperial County's use of Colorado River water in IID's service area.[21]

Despite intentional banishment of the Colorado River from its natural course into the Salton Basin, ongoing inflow of Colorado River wastewater into the basin throughout the 20th century and during the first portion of the 21st century enabled the Salton Sea to continue supporting millions of migratory and resident birds and hundreds of millions of fish, including threatened and endangered species. The Salton Sea is situated in a critical location for avian migration, at the juncture of the Pacific Flyway and the Intermountain West. Accordingly, more than 400 species of birds rely on the Salton Sea ecosystem—most, if not all, of them the same species that have used aquatic and wetland habitats in the Salton Basin for millions of years, as the

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[18] Crow, R.S. et al. (2021). Redefining the age of the lower Colorado River, southwestern United States. *Geology* 49(6):635-640, https://doi.org/10.1130/G48080.1. See also: Dorsey, R.J., et al. (2018). Punctuated Sediment Discharge during Early Pliocene Birth of the Colorado River: Evidence from Regional Stratigraphy, Sedimentology, and Paleontology. *Sedimentary Geology* 363:1-33, https://doi.org/10.1016/j.sedgeo.2017.09.018.

[19] Tectonic processes occurring at the boundary of the Pacific and North American plates, primarily manifested by movement along faults in the San Andreas fault system, caused the Colorado River's delta region to gradually transform from a typical fan shape into two hydrologically connected lobes that are now located to the north and south of the U.S.-Mexico border. The northern delta lobe in the northern Salton Trough contains the below-sea-level Salton Basin and Salton Sea, as well as the Imperial Valley; the southern delta lobe contains the Mexicali Valley and the subaerial delta region typically referred to as "the Colorado River delta," as well as the subaqueous delta at the head of the Gulf of California. See, e.g., Winker, C.D., and Kidwell, S.M. (1986). Paleocurrent evidence for lateral displacement of the Pliocene Colorado River delta by the San Andreas fault system, southeastern California. *Geology* 14:788-791.

[20] See, e.g., LaRue, E.C. (1925). *Water, Power and Flood Control of Colorado River below Green River, Utah*. Washington: Government Printing Office. 171 pages.

[21] California Natural Resources Agency (2025), Salton Sea Management Program 2025 Annual Report, p. 69. Annual data for 2024 indicate that 85.37% of the inflow to the Salton Sea derives from IID's use of Colorado River water. Updated annual data for 2025 are not yet available.

fossil record shows. Moreover, as lakes and wetlands across the western United States have withered since the 19th century, and many have vanished, the Salton Sea has transitioned from being ecologically important to being indispensable for the continued survival of numerous species.

As expanding development in the lower Colorado River Basin states increasingly tightened water supplies by the turn of the 21st century, California was pushed to adopt the multiparty 2003 Quantification Settlement Agreement (QSA) to ensure that the Golden State would not exceed its total annual allotment of 4.4 million acre-feet of Colorado River water. As required by the QSA and related water transfer agreements, and in accordance with the 2007 Colorado River Interim Operating Guidelines and additional voluntary agreements with Reclamation, since 2003 IID has conserved over 9.1 million acre-feet of Colorado River water that the District would otherwise have been legally entitled to use.[22] Pursuant to the QSA, IID will continue to transfer nearly 500,000 acre-feet of water annually to Southern California urban areas for decades to come. In order to conserve the volume necessary for the continuing QSA water transfers, IID has implemented various permanent water conservation measures (including, but not limited to, concrete lining of canals), and approximately 70% of irrigated farmland in IID's service area has been actively participating in the District's ongoing on-farm water-efficiency program designed to substantially decrease the amount of Colorado River water applied to agricultural fields in Imperial County.[23] Moreover, for 2025, IID received farmers' applications for 79.3% of the cropped acreage in the Imperial Valley to be included in the on-farm water-efficiency program.[24] Additionally, from 2023 through 2026, in collaboration with Imperial County farmers and with Reclamation's approval,[25] IID voluntarily undertook further measures to conserve more than 800,000 acre-feet of Colorado River water by implementing additional system conservation and deficit irrigation (partial fallowing) programs to help prop up the level of Lake Mead. Those additional IID water conservation programs implemented in 2023-2026 will add a grand total of 12 feet to Lake Mead's elevation.[26]

But as the amount of Colorado River wastewater flowing into the central Salton Basin shrinks, inevitably so does the Salton Sea. Thus, because of the major reductions in IID's use of Colorado River water mandated by the QSA and resulting from other recent water-use reductions approved by Reclamation, the Salton Sea is shriveling, its salinity is rapidly rising, the ecosystem is collapsing, and increasingly vast expanses of desiccated lakebed are polluting the air with hazardous dust containing toxic and carcinogenic components. Consequently, serious harm is occurring to fish and wildlife dependent on the Salton Sea ecosystem, and the health and economic well-being of more than half a million people living and working near the shrinking lake are in jeopardy.[27]

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[22] Pers. Comm. T. Shields, IID Water Department Manager, February 24, 2026. That provisional figure is for the amount conserved from 2003 through the end of 2025. When available, the final data will be posted at: https://www.iid.com/water/water-conservation.

[23] Draft Environmental Assessment of the IID 2024-2026 Temporary Colorado River System Water Conservation Project (Draft EA), pages 34 and 98.

[24] Pers. Comm. T. Shields, IID Water Department Manager, February 24, 2026.

[25] The relevant contracts between IID and Reclamation are: (a) the December 2023 System Conservation Implementation Agreement (2023 SCIA) between the United States and Imperial Irrigation District, and other related agreements, pertaining to Colorado River water conservation by IID during calendar year 2023; and (b) the August 2024 System Conservation Implementation Agreement (2024-2026 SCIA) between the United States and Imperial Irrigation District, and other related agreements, pertaining to Colorado River water conservation by IID during calendar years 2024-2026.

[26] Presentation by T. Shields, IID Water Manager, at the December 2025 Colorado River Water Users Association Annual Meeting, and pers. com. T. Shields, February 24, 2026.

[27] The following description of Salton Sea Impacts is not intended to be an exhaustive itemization of all the harmful effects on the Salton Sea ecosystem, fish and wildlife, the environment, the climate, and people throughout the surrounding region that are resulting from reductions in Salton Sea inflows and will be significantly exacerbated by the Proposed Action.

- Since the QSA water transfers started in 2003 (and primarily since those transfers ramped up rapidly in volume beginning in 2018), the area of the Salton Sea has decreased by approximately 65 square miles (41,800 acres), and the elevation of the lake's surface has dropped by nearly 15 feet.[28]
- Communities throughout the Salton Sea region, including but not limited to Tribes, are suffering significant, disproportionate, and unremedied negative effects on their health and socioeconomic well-being because of: (a) the QSA water transfers and additional recent Colorado River water cutbacks that have occurred pursuant to contracts between Reclamation and IID; (b) the resulting shrinkage of the Salton Sea, the ongoing collapse of the Salton Sea ecosystem, and the related deterioration of water quality in the lake, its tributaries, and associated wetlands and riparian areas; (c) pollution of the region's air by hazardous, toxic, and carcinogenic contaminants being emitted from exposed Salton Sea lakebed and the deteriorating lake itself; and (d) related impacts on the region's economy.
- Adverse impacts of freshwater deprivation on the Salton Sea, its tributaries, and associated wetlands and riparian areas are adversely affecting water quality and are impairing a variety of key biological systems necessary for supporting hundreds of species that depend on the Salton Sea ecosystem for essential aspects of their lives, including feeding and breeding.
- The salinity of the Salton Sea has risen so high—to a level more than double the salinity of ocean water—that the hundreds of millions of fish previously living there have been decimated, and they are now almost completely extirpated from the lake. Ongoing increases in salinity and other changes in water quality also threaten invertebrate populations that provide essential food for fish and birds dependent on the Salton Sea ecosystem—including species that are already endangered, threatened, or of special conservation concern under federal and state law.
- Degradation and loss of habitat in the Salton Sea ecosystem poses an existential threat to millions of migratory birds that have nowhere else to feed and recuperate in a vast arid region they must traverse twice-yearly during their long journeys. All of those birds are protected under the federal Migratory Bird Treaty Act and many of them are species designated as endangered, threatened, and/or of special conservation concern under federal and state law.
- Piscivorous birds reliant on the Salton Sea can no longer obtain sustenance that is crucial for their survival because the Salton Sea's fish population has crashed. The affected fish-eating bird species include, but are not limited to, Special Status Species such as the American white pelican (*Pelecanus erythrorhynchos*), the black skimmer (*Rynchops niger*), the gull-billed tern (*Gelochelidon nilotica*), the double-crested cormorant (*Nannopterum auritum*), and the wood stork (*Mycteria americana*); as well as Fully Protected Species in California such as the California brown pelican (*Pelecanus occidentalis californicus*).
- The shrinkage of the Salton Sea and the water quality problems in the lake, its tributaries, and associated wetlands and riparian areas are also jeopardizing the continued survival of other categories of bird species that are designated as endangered or threatened under federal and/or state law, or are otherwise designated as species of special conservation concern, and that are reliant on the Salton Sea ecosystem for essential habitat. Such species include, but are not limited to, the Yuma Ridgway's rail (*Rallus obsoletus yumanensis*), which is a federally-listed endangered species wherever found, and a threatened and fully-protected species under California law; the California black rail (*Laterallus jamaicensis coturniculus*), which is listed as a threatened species in California, and as a Species of Management Concern federally; and the Western snowy plover (*Charadrius nivosus nivosus*), which is a Species of Special Concern wherever it occurs in California, and the coastal population of which is listed as Threatened under federal law.
- The Desert Pupfish (*Cyprinodon macularius*), an endangered species under both federal and state law that depends on the Salton Sea ecosystem as its most important remaining stronghold, is increasingly

[28] These numbers were current as of March 2, 2026. For newer figures, see the following webpage, which summarizes data from a variety of sources and is updated periodically: https://pacinst.org/current-information-salton-sea/.

imperiled as the QSA water transfers and additional Colorado River water cutbacks cause worsening habitat loss and degradation.[29]

- Vast areas of lakebed left exposed as the Salton Sea shrinks are releasing dangerous PM_{10} and $PM_{2.5}$ particulates that contain numerous toxic and carcinogenic components including, but not limited to, heavy metals and metalloids such as arsenic, lead, chromium, nickel, cadmium, and selenium; banned pesticides such as dichlorodiphenyltrichloroethane (DDT); polychlorinated biphenyls (PCBs); and hazardous microbial components, such as microcystins from harmful algae blooms. These readily-inhalable, airborne particles being emitted from the Salton Sea's exposed lakebed are dispersed by the wind throughout the surrounding region and are already seriously harming the health of people living and working adjacent to the lake.[30] Many of the contaminants have no safe level of exposure.
- As freshwater deprivation alters water chemistry and negatively impacts the Salton Sea ecosystem, blooms of toxic algae in the lake, its tributaries, along shorelines, and in associated wetlands and riparian areas are becoming more frequent and widespread, and proliferation of other potentially harmful microorganisms is also occurring. Toxins associated with algae blooms and other hazardous microbial materials are adversely affecting fish and wildlife, and are jeopardizing the health of people via multiple exposure pathways. These dangerous substances are making their way into fugitive dust and are also becoming entrained in tiny aerosol droplets emitted from water surfaces and spread by the wind. For example, bloom-forming cyanobacterial species produce microcystins that are hepatotoxins, neurotoxins, cytotoxins, and dermatoxins, and can cause or contribute to acute liver failure, liver cancer, kidney disease, acute neurotoxicity, other neurological and neurodegenerative diseases, gastrointestinal diseases, cardiovascular disorders, respiratory and dermal disorders, and reproductive toxicity.[31] In addition, recent research indicates windblown bacterial endotoxins originating in the deteriorating Salton Sea are a probable culprit in high rates of lung inflammation and asthma occurring in communities adjacent to the lake.[32] Another recent study found that the risk of respiratory-related hospitalizations in populated areas downwind of the Salton Sea increased by about 25% for each 10-microgram-per-cubic-meter increase in coarse particulate matter (PM_{10} and $PM_{2.5}$) coming from the lake during periods when algae blooms occurred.[33]
- Hydrogen sulfide irruptions from the Salton Sea are also worsening as water quality deteriorates and the lake's ecosystem collapses. Those releases of dangerous fumes are polluting the air in adjacent populated areas and consequently are causing significant symptoms such as headaches, nausea, dizziness, and shortness of breath, and are damaging the already-impaired quality of life for

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[29] The U.S. Fish & Wildlife Service is conducting a 5-Year Status Review for the desert pupfish (87 FR 5834).

[30] Guo, F. et al. (2025). Dust Events and Children's Lung Function Near a Drying Saline Lake. *American Journal of Respiratory and Critical Care Medicine* 211(11): 2133–2136, https://doi.org/10.1164/rccm.202504-0799RL. Miao, Y., et al. (2025). Source-specific acute cardio-respiratory effects of ambient coarse particulate matter exposure in California's Salton Sea region. *Environ. Res.: Health* 3**:** 015006, https://doi.org/10.1088/2752-5309/ad934a. Biddle, T.A. et al. (2023). Aerosolized aqueous dust extracts collected near a drying lake trigger acute neutrophilic pulmonary inflammation reminiscent of microbial innate immune ligands. *Science of the Total Environment* 858(3):159882, https://doi.org/10.1016/j.scitotenv.2022.159882. Farzan, S.F. et al. (2019). Assessment of Respiratory Health Symptoms and Asthma in Children near a Drying Saline Lake. *Int. J. Env. Res. Public Health*, 16(20): 3828, https://doi.org/10.3390/ijerph16203828. Johnson, J.E. et al. (2019). The Disappearing Salton Sea: A Critical Reflection on the Emerging Environmental Threat. *Science of the Total Environment* 663: 804, https://doi.org/10.1016/j.scitotenv.2019.01.365.

[31] Lad, A., et al. (2022). As We Drink and Breathe: Adverse Health Effects of Microcystins and Other Harmful Algal Bloom Toxins in the Liver, Gut, Lungs and Beyond**.** *Life*, 12(3): 418**,** https://doi.org/10.3390/life12030418**.** Hedrick, E., et al. (2025). Microcystin: From Blooms to Brain Toxicity. *J Cell Signal* 6(1):29-38, https://doi.org/10.33696/Signaling.6.131.

[32] Yisrael-Gayle, K., et al. (2025). Evidence for Aerosolized Environmental Bacterial Endotoxin as an Environmental Health Hazard. *medRxiv* 2025.10.02.25337178, https://doi.org/10.1101/2025.10.02.25337178.

[33] Miao, Y., et al. (2025). Source-specific acute cardio-respiratory effects of ambient coarse particulate matter exposure in California's Salton Sea region. *Environ. Res.: Health* 3**:** 015006, https://doi.org/10.1088/2752-5309/ad934a.

disadvantaged people across the Salton Sea region, including Tribes. For example, a recent study found that from 2013 through 2024 the Torres Martinez Indian Reservation adjacent to the Salton Sea experienced hazardous hydrogen sulfide levels that significantly exceeded state standards for more than 250 hours every August.[34]

- The exposed Salton Sea lakebed is also emitting large quantities of biogenic greenhouse gases (including carbon dioxide, methane, and nitrous oxide), thereby threatening to undermine California's greenhouse gas (GHG) emission-reduction goals and to worsen climate change.[35] The ongoing emissions of GHGs are also associated with very high economic costs.[36]

Since the QSA was adopted in 2003, IID has complied with the many onerous requirements imposed by the terms of that agreement, and the residents of Imperial County have shouldered significant related burdens. In addition, IID and Imperial County farmers have implemented large additional reductions in the use of Colorado River water annually since 2023. In contrast, however, the State of California has violated its legal obligations related to the Salton Sea for more than two decades. Despite explicit statutory mandates and other legal requirements, the State has failed to restore the Salton Sea, has not undertaken measures necessary to appropriately mitigate the injurious effects of the QSA water transfers, and has not protected fish, wildlife, or people from entirely foreseen harm caused by decline of the Salton Sea and the deterioration of its ecosystem. In particular, the State did not prevent and has not properly mitigated the collapse of the Salton Sea fishery, has done almost nothing to conserve the fish-eating birds that have been deprived of their essential food supply,[37] and has not ensured that the harmful impacts of the QSA on endangered and threatened species dependent on the Salton Sea ecosystem are minimized and fully mitigated as required by law. Furthermore, the State has failed to avert ongoing harm to people throughout the Salton Sea region being caused by hazardous, toxic, and carcinogenic substances being emitted from the exposed lakebed and from the lake itself and other associated waterbodies as the Salton Sea shrinks, its ecosystem deteriorates, and water quality degrades.

In 2014, because of the State's ongoing failure to satisfy its legal obligations, IID initiated a proceeding at California's State Water Resources Control Board (SWRCB or Water Board) that had the potential to jeopardize the continuation of the QSA water transfers to Southern California urban areas. Ultimately, as a result of that proceeding, in 2017 the California Natural Resources Agency (CNRA) developed and agreed to expeditiously implement a "10-Year Plan" for interim mitigation of harm resulting from the QSA, by promptly constructing habitat areas and implementing dust mitigation measures on exposed lakebed. The CNRA also explicitly committed to promptly complete a long-term plan for Salton Sea restoration (which it was already required to do by the 2003 Salton Sea Restoration Act). In 2017, Water Board Order WR 2017-

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[34] Centeno, D., et al. (2025). Hypereutrophication, hydrogen sulfide, and environmental injustices: Mechanisms and knowledge gaps at the Salton Sea. *GeoHealth*, 9: e2024GH001327, https://doi.org/10.1029/2024GH001327.

[35] See the following peer-reviewed scientific report and the references cited therein: Ross, J.E. (2022). Potential Major Greenhouse Gas Emissions from Proposed Salton Sea Long-Range Plans. Report submitted to the California Natural Resources Agency. January 27, 2022. 14 pages. https://doi.org/10.13140/RG.2.2.36775.62884. Also see that report's Supplementary Information, explaining the possible magnitude of the greenhouse gas emissions involved: https://doi.org/10.13140/RG.2.2.10089.36964. Numerous additional studies supporting the conclusions of the foregoing report and its supplementary information have been published since that report was prepared. In particular, see the following study focused on biogenic greenhouse gas emissions from the exposed lakebed of the Great Salt Lake: Cobo, M., et al. (2024). A desiccating saline lake bed is a significant source of anthropogenic greenhouse gas emissions. *One Earth* 7(8):1414-1423, https://doi.org/10.1016/j.oneear.2024.07.001.

[36] This issue is discussed further in Part IV.F. below.

[37] Approximately 2000 acres of the State of California's "Species Conservation Habitat" (SCH), a project under development for more than a decade, finally became operational in spring 2025. It currently consists of an impoundment built on a small portion of the Salton Sea's exposed lakebed that contains Colorado River wastewater blended with a smaller quantity of Salton Sea water, and it hosts fish to provide a source of food for piscivorous birds.

0134 (the Stipulated Order) set forth the relevant requirements,[38] and incorporated those requirements as conditions of the ongoing QSA water transfers. In particular, the Stipulated Order mandated that the CNRA achieve specific annual acreage milestones for habitat creation and dust suppression on the exposed lakebed during January 1, 2018 through December 31, 2028[39] (which is actually an 11-year period, not 10 years), "in addition to currently planned and funded habitat projects (Red Hill Bay, Torres Martinez wetlands and Species Conservation Habitat)."[40] The Stipulated Order further specified, "No less than 50% of the acreage…shall provide habitat benefits for fish and wildlife that depend on the Salton Sea ecosystem. Projects that provide habitat benefits for fish and wildlife do not include dust control projects that involve surface roughening, vegetation enhancement and surface stabilization."[41] In addition, the Stipulated Order required the CNRA to "complete a long-term plan" for Salton Sea restoration "no later than December 31, 2022." The CNRA agreed to all these requirements and has been legally bound by them since 2017.

Nonetheless, the CNRA has continuously violated the requirements of the Stipulated Order since 2017. The CNRA did not "complete a long-term plan" for Salton Sea restoration by December 31, 2022; instead, in 2023 the agency's Salton Sea Management Program (SSMP) belatedly released an inadequate, deeply flawed, and scientifically unsound Draft Long-Range Plan[42] that was essentially just a rehashed presentation of suggested *options* for restoration that have been discussed but not acted upon for decades. That "plan" was not finalized until spring 2024, and its fundamental defects were not cured.[43] In addition, in every year since 2017 the CNRA has failed to comply with the mandatory acreage requirements for habitat creation and dust suppression at the Salton Sea imposed by the Water Board. For example, by the end of 2024 the CNRA was required to have created a grand total of 14,200 acres of habitat and dust mitigation measures, and at least 50% of that acreage (at least 7,100 acres) was required to be functional habitat. But, in reality, the grand total amount of habitat created by the CNRA through the end of 2024 was only 347 acres (just 4.89% of the habitat acreage required to have been created by then), and the agency had implemented "interim" and "completed" dust mitigation measures on a total of only 1302 acres (just 18.34% of the required dust suppression acreage). Although the 2026 SSMP Annual Report to the SWRCB—which will present data for habitat and dust mitigation acreage completed during 2025—has not yet been released, the SSMP's online Project Tracker indicates unofficially and provisionally that a grand total of 2,357 acres of habitat and a grand total of 2,425 acres of "interim" and "completed" dust mitigation measures were constructed from 2018 through the end of 2025.[44] This means that although the total amount of functional habitat mandated to be created by the CNRA during 2018-2028 is a minimum of 14,900 acres, currently—**eight years through the 2018-2028 period to which the Stipulated Order applies—the State has created only 15.8% of the required amount of habitat** (assuming the unofficial figures in the SSMP online Project Tracker are correct). Similarly, although the grand total amount of dust-suppression acreage mandated to be constructed by the CNRA during 2018-2028 is at least 14,900 acres, **the State has created only 16.4% of the required amount of dust mitigation**

[38] The specific requirements are set forth in Exhibit A of the Stipulated Order.

[39] Exhibit A to the Stipulated Order, pages 2-3, paragraph 24.

[40] Exhibit A to the Stipulated Order, page 2, paragraph 24. Importantly, the Red Hill Bay and Torres Martinez wetlands projects that were stated as ones "currently planned and funded," were never constructed. A portion of the Species Conservation Habitat, also specified in 2017 as "currently planned and funded" and explicitly excluded from being counted toward the acreage requirements mandated by the Stipulated Order, finally became operational in 2025.

[41] Exhibit A to the Stipulated Order, page 3, paragraph 25.

[42] My detailed public comments on the 2023 SSMP Draft Long-Range Plan are available at: https://doi.org/10.13140/RG.2.2.33676.37768.

[43] The SSMP's Final Long-Range Plan was released on March 15, 2024; a revised version was released on April 22, 2024. https://saltonsea.ca.gov/planning/ Only the Executive Summary is publicly available on the SSMP website. In order to obtain a full copy of the Final Long-Range Plan and all appendices, it is necessary to write to the CNRA and request that they be provided.

[44] See https://projects.saltonsea.ca.gov/Results/ProgressDashboard#fishAndWildlifeHabitat and https://projects.saltonsea.ca.gov/Results/ProgressDashboard#dustSuppression. The official data for calendar year 2025 will not be available until the 2026 SSMP Annual Report to the SWRCB is publicly released in spring 2026.

acreage (again assuming the unofficial online figures are correct), and only if "interim dust suppression" measures are included in the total. In addition, the Species Conservation Habitat project that the Stipulated Order stated was planned and funded as of 2017 and was therefore explicitly excluded from being counted toward fulfillment of the Order's acreage requirements, is nonetheless being counted by the State toward fulfillment of the acreage requirements and represents all of the habitat acreage created by the SSMP so far. Moreover, the SSMP's Red Hill Bay and Torres Martinez wetlands habitat projects that the Stipulated Order also stated were planned and funded as of 2017 were never constructed.

As discussed further in Part VI.B.1. below, it is not clear whether the remainder of the 10-Year Plan's projects will actually be built, and—even assuming they are constructed—it is also unclear whether they will operate as intended, in a safe and effective manner, and whether they will be sustainable.

Beginning in 2023, the U.S. Army Corps of Engineers (the USACE or the Corps) took over from the State the task of evaluating potential restoration approaches to achieve long-term revitalization or restoration of the Salton Sea ecosystem. For that purpose, as further discussed in Part VI.B.2. below, the USACE is currently conducting a multi-year feasibility study of partial revitalization and full restoration options, entitled the Imperial Streams and Salton Sea Aquatic Ecosystem Restoration Feasibility Study (ISSS Study). Unfortunately, however, the Corps has "adopted" and is "relying on"[45] the SSMP's inadequate and seriously defective Long-Range Plan, as well as the biased, scientifically unsound, and fatally flawed findings of the U.C. Santa Cruz panel[46] that was previously hired by the State of California to conduct a full feasibility study of ocean water importation options to restore the Salton Sea but that failed to perform the necessary work.[47] In addition, the USACE study is not fully funded, and the Corps appears to be fundamentally hampered in its ability to properly conduct the study because of major jurisdictional limitations. As the Salton Sea Authority—a non-federal co-sponsor of the ISSS Study—explained in its February 27, 2026 comments to Reclamation on the DEIS, those jurisdictional constraints include, but are not limited to, the following: "Corps policy does not permit the Corps to undertake projects on federal lands, nor does policy permit the Corps to count [in the benefit-cost analysis required to be conducted as part of the ISSS Study] the benefits of the [alternative actions evaluated in the] Feasibility Study provided to federal lands. Moreover, the Corps is also limited in its ability fully value the public health benefits of this work."[48] In addition, the Corps has publicly acknowledged that addressing water quality problems is not within the scope of the USACE's authority, and the ISSS Study will not specifically address those problems.[49] It is therefore unclear what sort of revitalization or restoration project the USACE study may ultimately recommend, and it also remains unclear whether that project will be approved and funded by Congress, whether it will be built, and whether it will actually be effective in addressing any of the harmful Salton Sea Impacts that are currently ongoing and that will worsen significantly in the future if Reclamation's Proposed Action is implemented.

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[45] Statements by Corrie Stetzel, USACE Water Resources Planner, during the November 20, 2025 Salton Sea Authority Board Meeting, agenda item IV.C. A video of the Board meeting is available at: https://saltonsea.com/events/salton-sea-authority-board-of-directors-meeting-11-20-2025/. Ms. Stetzel's presentation and comments begin at 25:50 in the video.

[46] In the video for which a link is provided supra in footnote 45, Ms. Stetzel refers to the U.C. Santa Cruz panel as "the independent review panel." Video of November 20, 2025 Salton Sea Authority Board Meeting, at 49:15 to 50:07.

[47] The serious problems affecting the State's Long-Range Plan and the U.C. Santa Cruz panel's contract, process, findings, and conclusions are analyzed in detail in my public comments on the Draft SSMP Long-Range Plan (available at https://doi.org/10.13140/RG.2.2.33676.37768) and my public comments on the work of the U.C. Santa Cruz panel (available at https://doi.org/10.13140/RG.2.2.30320.93448) that were submitted to both the State and the Corps in 2023.

[48] Salton Sea Authority (February 27, 2026). Public comments on the Draft Environmental Impact Statement (EIS) Post-2026 Operational Guidelines and Strategies for Lake Powell and Lake Mead, page 8. Available at: https://saltonsea.com/wp-content/uploads/2026/02/SSAComments_CRBPost2026EIS.pdf.

[49] Corrie Stetzel, USACE Water Resources Planner for the ISSS Study, stated during the November 20, 2025 Salton Sea Authority Board Meeting, "…we don't normally work in water quality; that falls under the authority of the Environmental Protection Agency… it's not part of our, directly part of our Army Corps of Engineers mission, unfortunately. So, we won't be formulating for that parameter specifically." A video of the Board meeting is available at: https://saltonsea.com/events/salton-sea-authority-board-of-directors-meeting-11-20-2025/. The quoted comments are at 48:21 to 49:14 in the video.

While the CNRA continues its chronic failure to comply with crucial legal mandates, and the USACE proceeds with a feasibility study that is incompletely funded, handicapped by jurisdictional constraints, and relies on the SSMP's inadequate and scientifically unsound Long-Range Plan and the U.C. Santa Cruz panel's biased and fatally flawed findings, the harmful impacts of the Salton Sea's freshwater deprivation are worsening and will continue to do so. The Salton Sea is shrinking ever more rapidly as IID's use of Colorado River water continues to decrease pursuant to the QSA and because of the District's further water conservation measures instigated and approved by Interior and Reclamation; the lake's salinity is rising at an accelerating pace, and is already more than twice the salinity of the ocean; increasingly large areas of exposed lakebed are emitting hazardous, toxic, and carcinogenic substances and greenhouse gases; the water quality in the lake, its tributaries, and associated wetlands is rapidly deteriorating; the survival of fish and wildlife dependent on the Salton Sea ecosystem, including endangered and threatened species, is increasingly in jeopardy; and people across the surrounding region are being subjected to grave harm that is potentially irreversible. And now, because of the Colorado River's genuine crisis, the Proposed Action will foreseeably deprive the Salton Sea ecosystem of even more water, and will substantially exacerbate the harm to fish and wildlife, the environment, the climate, Tribes, and other disadvantaged communities throughout the Salton Sea region that is already ongoing.

III. Reclamation is legally obligated to analyze the Salton Sea Impacts of the Proposed Action, and to commit to avoiding or minimizing and fully mitigating them, but has unjustifiably failed to do so in the DEIS

Any action alternative for managing the Colorado River in the Post-2026 Program that reduces water use by Salton Trough rights holders will necessarily exacerbate significantly the injurious impacts of freshwater deprivation that are already affecting the Salton Sea and its ecosystem, the remaining fish including an endangered species, hundreds of bird species including ones that are listed as endangered or threatened, the regional environment, the climate, and the health and socioeconomic well-being of more than half a million people throughout the surrounding area. In compliance with the National Environmental Policy Act (NEPA),[50] the NEPA implementing regulations,[51] associated case law, and other applicable law, Interior and Reclamation are legally obligated to fully analyze these issues in the EIS for the Proposed Action, and to identify and commit to implementing measures that will avoid, or minimize and fully mitigate to the greatest feasible extent, the cumulative and significant Salton Sea Impacts that are reasonably foreseeable consequences of the Proposed Action. Nonetheless, the DEIS unjustifiably fails to address these issues. In addition, the Proposed Action must comply with other applicable laws, including but not limited to the requirements of the Clean Air Act,[52] the Endangered Species Act,[53] and the Migratory Bird Treaty Act,[54] as well as associated rules, regulations, and case law. [55]

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[50] Pub. L. 91–190, 42 U.S.C. 4321 et seq.

[51] National Environmental Policy Act Implementing Regulations (May 20, 2022). 40 CFR Parts 1500-1508.

[52] 42 U.S.C. §§ 7401–7671q.

[53] 16 U.S.C. §§ 1531–1544.

[54] 16 U.S.C. §§ 703-712.

[55] Furthermore, Interior is also legally obligated to comply with all relevant laws that are applicable to the very large portions of land adjacent to and beneath the Salton Sea that are owned and/or managed by Interior and agencies within that Department, including Reclamation, the Bureau of Land Management, and the U.S. Fish & Wildlife Service. (See https://www.usbr.gov/lc/region/programs/SaltonSeaProjectsMap.pdf.) As Interior and Reclamation know, foreseeably the Proposed Action will have harmful consequences that will cause those lands to violate applicable laws, including but not limited to the Clean Air Act and its implementing rules and regulations. For example, see the Addendum to the August 31, 2016 Memorandum of Understanding By and Between the U.S. Department of the Interior and the State of California Natural Resources Agency Regarding the Coordination of Activities to Manage the Salton Sea (signed by Interior Jan. 17, 2017), which provided, "…Parties will comply with all applicable requirements of the Federal Clean Air Act and all implementing rules and regulations in connection with potential air quality emissions from Salton Sea

The NEPA implementing regulations define 'cumulative impacts' of a proposed federal action as:

> "…the impact on the environment which results from **the incremental impact of the action when added to other past, present, and reasonably foreseeable future actions regardless of what agency (Federal or non-Federal) or person undertakes such other actions.** Cumulative impacts can result from individually minor but collectively significant actions taking place over a period of time."[56]

Reclamation acknowledged the nature of cumulative impacts in the 2024 Final SEIS for Near-Term Colorado River Operations:

> …cumulative impacts refer to two or more individual impacts that, when considered together, are significant or that compound or increase other environmental impacts. Cumulative impacts can be categorized as additive and interactive. An additive impact results from additions from one kind of source through either time or space. An interactive impact results from more than one kind of source.[57]

In addition to evaluating whether the harmful effects of the Proposed Action are cumulative, Reclamation was required by law to analyze whether the negative effects will be significant. The NEPA implementing regulations state:

> "**In considering whether an adverse effect of the proposed action is significant, agencies shall examine both the *context* of the action and the *intensity* of the effect.**"[58]

For the analysis of "context," agencies are directed to consider "the characteristics of the geographic area, such as **proximity to unique or sensitive resources or communities with environmental justice concerns**,"[59] and also "**the potential global, national, regional, and local contexts** as well as **the duration, including short-and long-term effects**."[60]

For the analysis of "intensity," the NEPA implementing regulations state in part:[61]

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playa lands owned or managed by the Parties that are exposed as a result of decline in elevation of the Salton Sea." https://www.doi.gov/sites/doi.gov/files/uploads/signed_addendum_connor_salton_sea.pdf. Interior and Reclamation also know that very costly mitigation measures will be required to be implemented on the lands they own and manage in order to mitigate the harmful air quality impacts of reduced inflows to the Salton Sea. For example, Reclamation explicitly acknowledged the need for mitigation and the high costs involved in the agency's FY 2021 Official Budget Justifications. That document states: "Reclamation estimates that approximately 8.75 square miles of Reclamation-owned lands will be emergent from the Sea as it recedes over the next 10 years. Even using extremely conservative estimates related to the costs at Owens Lake, Reclamation may still have significant air quality mitigation costs related to any applicable Clean Air Act requirements as the Sea recedes." (Pages 41-42.) In the same document (at page 41), Reclamation specifies the costs at Owens Lake for mitigating particulate pollution as: "…air quality mitigation establishment costs at approximately $38 million per square mile (averaged over all types of mitigation) and annual maintenance costs of approximately $500,000 per square mile." Applying those numbers to the 8.75 square miles of Reclamation-owned lands at the Salton Sea yields a minimum cost of $332.5 million for establishing air quality mitigation measures, and an annual operations and maintenance cost of at least $4.375 million.

[56] 40 CFR 1508.7, emphasis added.

[57] Final SEIS for Near-Term Colorado River Operations, page 3-10.

[58] 40 CFR 1501.3(d), bold emphasis and italics added.

[59] 40 CFR 1501.3(d)(1), emphasis added.

[60] Ibid., emphasis added.

[61] 40 CFR 1501.3(d)(2), emphasis added.

> …**Agencies shall analyze the intensity of effects considering the following factors,** as applicable to the proposed action and in relationship to one another**:**
>
> (i) The degree to which the action **may adversely affect public health and safety**.
> (ii) The degree to which the action **may adversely affect** unique characteristics of the geographic area such as…**ecologically critical areas**.
> (iii) Whether the action **may violate relevant Federal, State, Tribal, or local laws** or other requirements **or be inconsistent with Federal, State, Tribal, or local policies designed for the protection of the environment**.
> …….
> (vi) The degree to which the action **may adversely affect an endangered or threatened species or its habitat**, including habitat that has been determined to be critical under the Endangered Species Act of 1973.
> (vii) The degree to which the action **may adversely affect communities with environmental justice concerns**.
> (viii) The degree to which the action **may adversely affect rights of Tribal Nations** that have been reserved through treaties, statutes, or Executive Orders.

In evaluating the significance of the reasonably foreseeable adverse impacts of the Proposed Action, Reclamation was required in part to consider various key aspects of the context in which the Proposed Action will occur. Critical to the Proposed Action's context is the comprehensive, two-decade-long failure by the State of California to comply with legal mandates to restore the Salton Sea and to avoid or minimize and fully mitigate the harmful effects of the QSA water transfers on fish, wildlife, the environment, and people. This ongoing violation of legal requirements has had and continues to have significant and harmful Salton Sea Impacts. Moreover, the extent of those impacts was not anticipated in the EIR/EIS for the QSA because no one expected that the State of California would violate its legal obligations throughout the past two decades.[62] Reclamation should have considered that crucial context in the DEIS, but did not.

Concerning the "intensity" of effects foreseeably resulting from Reclamation's Proposed Action, there is no reasonable doubt that it will cause a variety of significant cumulative impacts that include ones explicitly enumerated in the NEPA implementing regulations as factors affecting the intensity of an agency's contemplated action, as quoted above. It is also clear that the consequences of the Proposed Action will interact with and compound the environmental, ecological, and human-health impacts of the QSA water transfers and the additional recent cutbacks in Colorado River water use by IID during 2023-2026 that were approved by Reclamation, including the unmitigated adverse impacts resulting from the State of California's failure to comply with its legal obligations relating to the Salton Sea for more than twenty years.

The Proposed Action will foreseeably result in large additional reductions in Colorado River water use by IID, beyond the cutbacks already occurring because of the QSA and the 2023 and 2024-2026 SCIAs, and those additional reductions may be ongoing over the course of many years. It is clear such additional reductions in IID's Colorado River water use will significantly reduce Salton Sea inflow and greatly worsen the dreadful consequences for people, fish and wildlife, the regional environment, and the climate that are already occurring as a result of the Salton Sea's ongoing freshwater deprivation, and that have been inadequately addressed for many years by the responsible government agencies.[63]

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[62] In light of the State of California's egregious and ongoing violation of its legal obligations for more than twenty years, and considering the significant harm that has been occurring as a result of that unexpected and chronic violation of law, arguably a Supplemental EIS process concerning the QSA water transfers should have been initiated previously pursuant to 40 CFR Part 1502.9(d)(1)(ii).

[63] The Proposed Action will also cause foreseeable and significant adverse impacts on recreation, cultural resources including Tribal cultural resources, visual resources, paleontological resources, and socioeconomics throughout the Salton Sea region. See my public comments on the 2024 Draft SEIS for Near-Term Colorado River Operations: https://www.usbr.gov/ColoradoRiverBasin/documents/NearTermColoradoRiverOperations/PublicComments/Organizations/557_Stout%20Research%20Center_508.pdf

Despite the fact that the Proposed Action will foreseeably have cumulative and significant harmful consequences throughout the Salton Sea region, including but not limited to ones that are likely to violate the Clean Air Act, the Endangered Species Act, and the Migratory Bird Treaty Act, and associated rules, regulations, and case law, the DEIS completely fails to address the relevant issues.[64] Instead, Reclamation states, "While any resultant impacts on the Salton Sea may be accelerated by Post-2026 policies, the overall magnitude of impacts would not change."[65] Essentially, Reclamation is claiming that harmful Salton Sea Impacts resulting from the Proposed Action will not be cumulative or significant as those concepts are defined under applicable law, because the QSA water transfers will cause the same effects decades from now. This claim is unjustified, unreasonable, and legally untenable.

By alleging that the Proposed Action will not result in additional or cumulative harm beyond the consequences that the QSA will cause, Reclamation is essentially saying that the ongoing QSA water transfers will eventually destroy the Salton Sea, expose most of its lakebed, and cause devastating and irreversible harm to fish, wildlife, and people anyhow, so overall it doesn't matter that the Proposed Action will substantially expedite the demise of the Salton Sea and its ecosystem; significantly increase the amount of exposed lakebed emitting large quantities of hazardous, toxic, and carcinogenic particulates, including substances for which there is no safe level of exposure; cause dreadful impacts on people, including additional debilitating disease and even death; imperil the continued survival of endangered and threatened species, and hundreds of other species dependent on the Salton Sea ecosystem; and continue to cause all of this harm for many years.[66] That is an insupportable claim, both legally and morally. If Mr. X were to strangle Mr. Y to death and then declare that his action caused no additional harm to Mr. Y because Mr. Y would have died eventually anyhow (as we all will), that assertion would obviously be ludicrous and legally indefensible. Reclamation's claim in the DEIS is no less ludicrous and indefensible.

The Proposed Action is likely to reduce Salton Sea inflows by a minimum of hundreds of thousands of acre-feet annually, and potentially far more, in addition to the very large amount by which inflows are already reduced because of the QSA water transfers. Those additional reductions will rapidly expose vast areas of lakebed. For example, modeling for the Final SEIS for Near-Term Colorado River Management determined that reductions in use of Colorado River water by Salton Trough rights holders during 2024-2026 would cause the exposure of up to 35,594 acres of lakebed through 2026.[67] Furthermore, that modeled amount of exposed lakebed did not account for the effects of 10-Year Plan projects, including the Species Conservation Habitat project, or for consumption of water by emergent vegetation and actively planted vegetation on the exposed lakebed; if the modeling had done so, the amount of exposed lakebed resulting from reduced inflow into the Salton Sea would have been larger. Even if annual decreases in Salton Sea inflows pursuant to the current Proposed Action are comparable to and not more voluminous than the ones occurring during 2024-2026 pursuant to the Final SEIS for Near-Term Colorado River Management, the additional inflow reductions beginning in 2027 will cause much more expansive areas of lakebed to be exposed because they will very likely be sustained across a longer period of time. Moreover, the amount of lakebed to be exposed will be

[64] Reclamation could not have been genuinely unaware of the fact that the reductions in use of Colorado River water by Salton Trough water users that will foreseeably be necessitated by the Proposed Action will result in significant harmful impacts (consistent with the definition of "significance" under applicable law, including but not limited to 40 CFR Part 1501.3(d)) on the Salton Sea and its ecosystem, fish and wildlife reliant on that ecosystem, the regional environment, the climate, and the health, safety, and socioeconomic well-being of people throughout the surrounding area. At a bare minimum, my detailed scoping coming for the Post-2026 Program in August 2023, as well as my public comments on Reclamation's Revised Draft SEIS for Near-Term Colorado River Operations in December 2023, provided clear notice to the agency that additional cutbacks in IID's use of Colorado River water would indeed cause significant adverse impacts of those types, and would require an appropriate analysis in any related EIS. Public comments by others also provided such notice to Reclamation.

[65] DEIS, Chapter 3, section 3.2.7, page 3-24.

[66] Although the period during which the Proposed Action will be in effect is not yet known, presumably the time-frame will be at least 5 years and potentially much longer.

[67] Final SEIS for Near-Term Colorado River Management, page 3-146.

even greater because of water consumption by additional components of the 10-Year Plan and other factors. Thus, it is foreseeable that very large additional expanses of lakebed—far beyond the area projected to be exposed because of the QSA—will become exposed annually as a result of the Proposed Action, and that exposure will be ongoing over the course of many years, and even for decades. In fact, as a result of the Proposed Action the Salton Sea is likely to be reduced to a relatively small and extraordinarily hypersaline brine sink that cannot support any living thing other than halophilic bacteria, viruses, and other microorganisms, many of which will post serious risks of harm to wildlife and people.

It is foreseeable that the additional areas of lakebed to be exposed as a result of the Proposed Action will emit dangerous particulates containing hazardous, toxic, and carcinogenic constituents into the region's air, and the readily-inhalable pollutants will have significant harmful effects on public health in the adjacent populated areas, including injurious impacts on Tribes and other environmental justice communities, that will compound the detrimental effects of the twenty-year failure by government officials to remedy the consequences of the QSA. Many of the dangerous substances involved have no safe level of exposure. Thus, it is foreseeable that the Proposed Action will cause people throughout the Salton Sea region to suffer substantially worsened morbidity and mortality for many years. That dire and irreversible harm is not rendered inconsequential because the QSA water transfers conceivably *might* ultimately cause the same impacts decades from now.

The Proposed Action will also reduce the quantities of water in Salton Sea tributaries and associated wetlands and riparian areas, substantially increase the lake's salinity and have other adverse impacts on water quality, and will thereby jeopardize the survival of fish and wildlife dependent on the Salton Sea ecosystem. It is foreseeable that many fish and birds—including ones that are already endangered and threatened, as well as other Special Status Species—will be killed, and even completely extirpated or pushed entirely to extinction, as a result of the substantial, ongoing reductions in freshwater inflows that will foreseeably occur pursuant to the Proposed Action. That major and irreversible harm is not rendered inconsequential because the QSA water transfers conceivably *might* someday cause the Salton Sea ecosystem to collapse fully and all the fish and wildlife reliant on it to disappear eventually.

The assertion by Reclamation in the DEIS that the harm to be caused by the Proposed Action is not cumulative or significant because it will happen eventually anyhow due to the QSA is specious for another reason as well: The allegedly inevitable long-term harm will not actually occur if government officials comply with their legal obligations to restore the Salton Sea. As noted earlier, to combat the impacts of the QSA, restoration of the Salton Sea was legally required by statute in 2003 at the time the QSA was finalized. That legislation was specifically intended to prevent significant future harm to fish, wildlife, and people resulting from the QSA water transfers. The Salton Sea Restoration Act[68] mandates action to restore the habitats necessary for permanently supporting the numbers and variety of fish, birds, and other wildlife originally reliant on the Salton Sea ecosystem, and to protect people from various types of injurious consequences that will result if the lake continues to shrivel from freshwater deprivation, more of its lakebed is exposed, and its ecosystem collapses. If government officials fully satisfy their legal responsibilities, serious future harm to fish, wildlife, and people that would otherwise ultimately occur in the coming decades because of the QSA will not materialize.

The Proposed Action will cause cumulative and significant harm to fish, wildlife, and people long before full long-term restoration of the Salton Sea can feasibly be implemented, and also before the State completes and operates the interim projects in the 10-Year Plan necessary to satisfy its shirked legal obligations to properly mitigate harm resulting from the QSA water transfers. Moreover, some of the harmful consequences of the Proposed Action will be irreversible even if comprehensive restoration of the Salton Sea ultimately occurs in the future. Many foreseeable negative effects of the Proposed Action—including major emissions of

[68] California Fish and Game Code Chapter 13, Sections 2930 et seq. The Salton Sea Restoration Act was originally passed in 2003 as part of a package of legislation related to the 2003 QSA. It was strengthened in 2013 by passage of amendments that provided greater detail regarding the intent of the California Legislature in mandating Salton Sea restoration, clarified the State's specific restoration obligations, and required that the CNRA Secretary lead restoration efforts in coordination with the Salton Sea Authority.

hazardous particulates and greenhouse gases from exposed lakebed, die-offs of fish and birds, and human morbidity and mortality—constitute irremediable harm that cannot be retroactively cured by subsequent restoration actions. It is unreasonable and contrary to applicable law for Reclamation to assert, in essence, that none of this harm matters.

When previously proposing other recent agency actions that would also reduce inflows to the Salton Sea and would also foreseeably cause significant additional harm beyond the impacts of the QSA. Reclamation has repeatedly made essentially the same insupportable assertion that the agency has now made in the DEIS, i.e., that Salton Sea Impacts will not be cumulative or significant because the QSA will cause the same effects eventually. That unjustifiable assertion was made by Reclamation in the following documents: the Revised Draft Supplemental Environmental Impact Statement for Near-Term Colorado River Operations,[69] the Final Supplemental Environmental Impact Statement for Near-Term Colorado River Operations,[70] the Draft Environmental Assessment for the IID 2024-2026 Temporary Colorado River System Water Conservation Project,[71] and the Final Environmental Assessment for the IID 2024-2026 Temporary Colorado River System Water Conservation Project.[72] Despite public comments, including my own, pointing out that in fact the harm to be caused by the actions proposed in those documents would indeed be cumulative and significant, the agency nonetheless failed to respond appropriately to those comments and proceeded with the proposed actions. Those actions have greatly reduced inflows to the Salton Sea beyond the reductions resulting from the QSA, and have caused additional and significant harm. Now Reclamation makes the same indefensible claim again in support of another Proposed Action that will cause even worse harm to the Salton Sea and its ecosystem, fish and wildlife dependent on that ecosystem, the regional environment and the climate, and more than half a million people throughout the surrounding region. This is death by a thousand cuts, and Reclamation is wielding the knife.

The federal government has a responsibility "…to use all practicable means, consistent with other essential considerations of national policy, to… attain the widest range of beneficial uses of the environment **without degradation, risk to health or safety, or other undesirable and unintended consequences**…"[73] Similarly, the NEPA implementing regulations state, "**Federal agencies shall to the fullest extent possible… Use all practicable means**, consistent with the requirements of the Act and other essential considerations of national policy, **to restore and enhance the quality of the human environment and avoid or minimize any possible adverse effects of their actions upon the quality of the human environment.**"[74] For Reclamation to proceed with the Proposed Action as currently formulated would be to violate these most fundamental federal responsibilities.

The DEIS presents inadequate, incorrect, and legally insupportable assertions and fails to properly analyze: (a) the significant direct, indirect, cumulative, and disproportionate negative impacts on the Salton Sea, the fish and wildlife reliant on the Salton Sea ecosystem, the environment, the climate, and people throughout the areas adjacent to the lake—including, but not limited to, Tribes and other environmental justice communities—that foreseeably will result if Reclamation proceeds with the Proposed Action; (b) alternatives for avoiding the foregoing adverse impacts; and (c) effective mechanisms for minimizing and fully mitigating the harmful effects that cannot be avoided. Reclamation's failure in the DEIS to properly evaluate the Proposed Action's harmful Salton Sea Impacts clearly violates the agency's legal obligations and must be fully remedied in a revised DEIS.

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[69] https://www.federalregister.gov/d/2023-23759/p-9.

[70] https://www.usbr.gov/ColoradoRiverBasin/documents/NearTermColoradoRiverOperations/20240300-Near-termColoradoRiverOperations-FinalSEIS-508.pdf

[71] https://www.usbr.gov/lc/region/g2000/envdocs.html.

[72] Ibid.

[73] NEPA, Section 101(b), emphasis added.

[74] 40 CFR Part 1500.2, emphasis added.

IV. Statements by Reclamation in the DEIS related to Salton Sea issues and Salton Sea Impacts are factually incorrect, misleading, and legally insupportable; and the agency's omissions violate applicable law

IV.A. Statements in the DEIS related to Salton Sea inflows are incorrect and misleading

In the DEIS Reclamation claims that, "Over the past 20 years, inflows to the Salton Sea have declined from 1.3 MAF per year to approximately 1.1 MAF per year."[75] This statement is incorrect and misleading; in reality, inflows have declined significantly more than Reclamation acknowledges, and will very likely continue to do so. Although total inflows to the Salton Sea were 1.094 MAF in 2021, they were 1.065 MAF in 2022, 0.987 MAF in 2023, 0.909 MAF in 2024,[76] and 0.890 MAF in 2025.[77] Inflows to the Salton Sea will very likely decline further in 2026 as a result of ongoing water conservation measures instigated and approved by Reclamation and the unusually high temperatures occurring this year in the Salton Trough, as well as because of the potential need for Reclamation to implement emergency reductions in Colorado River water allocations in the event that reservoir levels drop to critically low elevations due to the very dry conditions that are adversely affecting Colorado River streamflow. If the Proposed Action is implemented beginning in 2027, inflows will foreseeably plummet even further.

Reclamation also states in the DEIS that the lowest inflows to the Salton Sea that will occur pursuant to the Proposed Action would be 783,000 af; and claims further that, "Any resultant impacts [of the Proposed Action] are within the scope and range of inflows being considered in the SSMP's long-range plan and the USACE's ongoing NEPA process."[78] These statements are false and misleading. Catastrophically low allocations of water to Lower Basin states will foreseeably occur in the future as a result of worsening hydrology in the Colorado River Basin, and may even occur by the end of 2026. Based on the current dry conditions in the Upper Basin, in combination with the already-low elevations of reservoirs, Reclamation has projected that the elevation of Lake Powell may drop below minimum power pool by December 2026.[79] As Reclamation certainly knows, that scenario would necessitate radical reductions in the provision of Colorado River water to Lower Basin rights holders, including Salton Trough rights holders. If that situation occurs, inflows to the Salton Sea will plummet by an extreme amount. The water arriving in the lake would be a tiny fraction of 783,000 af, and far lower than the lowest inflow anticipated in the State's Long-Range Plan. Since the USACE is relying on the State's Long-Range Plan for its NEPA analysis,[80] the foreseeable inflows to the Salton Sea in the foregoing dire scenario would also be far lower than the inflows the Corps is considering.

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[75] DEIS, Chapter 3, Section 3.2.7, page 3-23.

[76] Figures for inflow each year during 2021-2024 are presented in the 2025 SSMP Annual Report, p.69. That report is available online at: https://saltonsea.ca.gov/wp-content/uploads/2025/03/2025-Annual-Report_508_WCAG.pdf.

[77] Pers. Com. S. Roy and K. Heidel at Tetra Tech, Inc., February 24, 2026. Tetra Tech is the contractor for the State of California that is assisting the State with preparation of the SSMP 2026 Annual Report, which has not yet been released.

[78] DEIS, Chapter 3, Section 3.2.7, page 3-24. It is unclear how the figure of 783,000 af was derived; it appears incorrect.

[79] U.S. Bureau of Reclamation, 24-Month Study Projections, Lower Colorado River Operations, Feb. 14, 2026. Available online at: https://www.usbr.gov/lc/region/g4000/riverops/24ms-projections.html.

[80] Statements by Corrie Stetzel, USACE Water Resources Planner, and Patrick O'Dowd, Executive Director/General Manager of the Salton Sea Authority, during the Salton Sea Authority Board Meeting on November 20, 2025, agenda item IV.C. A video recording of the meeting is available at: https://saltonsea.com/events/salton-sea-authority-board-of-directors-meeting-11-20-2025/.

IV.B. Statements in the DEIS related to Reclamation's authority appear to be inaccurate

In the DEIS, Reclamation also indicates that it does not have the authority to address Salton Sea Impacts because, "Reclamation does not control the end use and management of delivered or conserved water. As such, Reclamation has no management authority over inputs to the Salton Sea, and Reclamation has no enforcement authorities over the Salton Sea." This assertion appears to be inaccurate.

I am aware of at least one significant instance in which Reclamation did "control the end use and management of delivered or conserved water" and did exert "management authority over inputs to the Salton Sea." In 2010 IID announced that it would be making early deliveries into the Salton Sea of QSA mitigation flows destined for the lake in 2011 and 2012 pursuant to the District's QSA-related obligations, using part of IID's Colorado River water entitlement. The Metropolitan Water District (MWD) vehemently opposed the proposal, and argued that such deliveries would violate the Law of the River. IID maintained such early deliveries were necessary because of legal uncertainty at that time concerning the future of its QSA fallowing program, which was conserving the water used for mitigation inflows. The QSA had just been invalidated by the California Superior Court handling litigation regarding that complex series of agreements, and appeal of that court's ruling was pending. IID wanted to be sure that its legal obligations to provide mitigation flows into the Salton Sea would be met during pendency of the appeal, regardless of uncertainty about the future of the fallowing program. But MWD was immovable in objecting, and was not alone in challenging the early deliveries of mitigation water; other water agencies in other Colorado River Basin states expressed similar concerns that the suggested action would contravene the Law of the River. Most importantly, Reclamation told IID that sending Colorado River water directly into the Salton Sea was improper, notwithstanding the uncertainties involved in the QSA litigation.[81] Ultimately, because the early deliveries of mitigation water were in fact sent into the Salton Sea by IID, Reclamation later required the District to "repay" those amounts of Colorado River water to USBR.[82]

IV.C. Reclamation's reliance on the SSMP 10-Year Plan and USACE feasibility study to address Salton Sea Impacts of the Proposed Action is misguided

Reclamation relies on the activities of the SSMP and the USACE to avoid or mitigate any Salton Sea Impacts that may occur because of the Proposed Action, but that reliance is inappropriate and relies on incorrect and misguided assumptions. The DEIS states:

> The California Natural Resources Agency established the Salton Sea Management Program (SSMP) to oversee restoration efforts at the Salton Sea. Currently, the SSMP is working with local, state, tribal, and federal partners to implement the first phase of habitat restoration projects to establish at least 14,900 acres of aquatic habitat and up to 14,900 acres of vegetated habitat by the year 2028 (USACE 2024). Additionally, the SSMP released a long-range plan to address future recession of the Salton Sea beyond the year 2028 (California Natural Resources Agency 2024). The goal of the plan is to protect or improve air quality, water quality, and wildlife habitat to prevent or reduce health and environmental consequences anticipated from the long-term recession of the Salton Sea shoreline (California Natural Resources Agency 2024) … The SSMP's long-range plan is informing the scope of the Imperial Streams and Salton Sea Ecosystem Restoration Feasibility Study and NEPA compliance that the USACE is currently preparing. Once that process is complete, state and federal funding will be pursued to support the resultant design and construction of restoration projects, beginning around 2028.[83]

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[81] Some of the background details and correspondence among the parties related to these issues are in the following document: https://www.iid.com/home/showpublisheddocument/4698/635648001335730000

[82] The details of this "repayment" are complicated and beyond the scope of these comments.

[83] DEIS, Chapter 3, Section 3.2.7, page 3-23.

The 10-Year Plan is not fully funded, and—contrary to the claims of Reclamation—the SSMP is so far behind in performing the necessary work, as explained in Part II above, that there is no reasonable hope the remaining work to implement the 10-Year Plan will actually be completed by 2028. In addition, as also explained above, the State's Long-Range Plan is not itself an action plan for restoration that is actually being implemented; rather, it is a presentation of options for partial revitalization and full restoration that contains serious and fundamental deficiencies and defects that render its analysis scientifically unsound.[84] Furthermore, the multi-year USACE Imperial Streams and Salton Sea Aquatic Ecosystem Restoration Feasibility Study (the ISSS Study) that Reclamation references is also not fully funded, it is only in a formative stage, and it is hampered by major jurisdictional constraints and self-imposed subject-matter limitations, as described in Part II above. It is not expected to be completed by 2028, and any project it proposes will not be congressionally approved and funded (assuming that ultimately it is, in fact, approved and funded) until the end of 2030 or potentially even later. As explained in further detail in Part VI.B. below, the SSMP's 10-Year Plan, the SSMP's Long-Range Plan, and the activities of the Corps related to the ISSS Study do not even come close—either temporally or substantively—to being capable of avoiding, or minimizing and fully mitigating, the rapid and extremely harmful Salton Sea Impacts that the Proposed Action will foreseeably cause beginning in 2027.

IV.D. The DEIS fails to perform the necessary analysis of the Proposed Action's harmful impacts on air quality and public health in the Salton Sea region

The Proposed Action will foreseeably cause elevated quantities of hazardous, toxic, and carcinogenic contaminants and noxious fumes to pollute the air across the Salton Sea region, causing injurious and even potentially lethal impacts on people. Reclamation completely failed to analyze these issues and must do so appropriately and fully in a revised DEIS.

Dust emissions resulting from the Proposed Action will foreseeably pollute inhabited areas with substances identified and regulated under federal and state law as hazardous, toxic, and carcinogenic. The inhalable pollutants will pose significant additional health threats to people in communities adjacent to the Salton Sea, including members of federally recognized Tribes, compounding the harm already being caused by the exposure of lakebed as a result of the ongoing QSA water transfers and additional water cutbacks instigated and approved by Reclamation during 2023-2026.

As defined by the U.S. Environmental Protection Agency, "Hazardous air pollutants, also known as toxic air pollutants or air toxics, are those pollutants that are known or suspected to cause cancer or other serious health effects, such as reproductive effects or birth defects, or adverse environmental effects."[85] 188 substances qualifying as HAPs are listed pursuant to section 7412 of Title 42 of the U.S. Code and regulated by the U.S. Environmental Protection Agency.[86] In addition, Section 39655 of the California Health and Safety Code states that a toxic air contaminant (TAC) is "an air pollutant which may cause or contribute to an increase in mortality or an increase in serious illness, or which may pose a present or potential hazard to human health." The California Air Resources Board has formally identified 200 substances that qualify as TACs, including but not limited to all federally-identified HAPs.[87]

Numerous contaminants that are present in Salton Sea sediments and that are very likely to be constituents of the dust emitted from the exposed lakebed into the air breathed by people throughout the surrounding region are listed and regulated as hazardous air pollutants (HAPs) under federal law and as toxic air contaminants

[84] See Part II above, and the links in footnote 47 for my detailed comments on the 2023 SSMP Draft Long-Range Plan and on the fatally flawed work of the U.C. Santa Cruz panel that was incorporated into the Long-Range Plan.

[85] https://www.epa.gov/haps/about-hazardous-air-pollutants.

[86] The current HAP list is available at: https://www.epa.gov/haps/initial-list-hazardous-air-pollutants-modifications.

[87] Substances listed as federal hazardous air pollutants (HAPs) are TACs under California law pursuant to Section 39657(b) of the California Health and Safety Code.

(TACs) under California law. Those harmful contaminants in lakebed sediments include, but are not limited to, heavy metals and metalloids such as arsenic, lead, chromium, nickel, cadmium, and selenium; polychlorinated biphenyls (PCBs); and residues of numerous legacy pesticides, such as DDT, that have been banned or severely restricted but previously accumulated in the Salton Sea's lakebed while they were in use in the U.S. and/or in Mexico.[88]

The harmful health effects of acute and chronic inhalation of the tiny airborne particulates known as PM_{10} and $PM_{2.5}$ are well established scientifically, and include but are not limited to respiratory symptoms, asthma attacks, acute and chronic bronchitis, worsening of chronic obstructive pulmonary disease (COPD), restricted activity days, increased emergency room visits and hospitalizations for pulmonary and cardiac causes, and premature mortality. Moreover, PM_{10} and $PM_{2.5}$ emitted from the exposed Salton Sea lakebed pose even greater risks of harm because they contain a variety of toxic and carcinogenic components designated as HAPs and TACs, as well as other dangerous substances such as microcystins from toxic algae blooms and *Coccidioides* fungal spores that cause serious and potentially lethal diseases. Dust emitted from the Salton Sea lakebed is "uniquely toxic," and far more hazardous than typical desert dust.[89] People in communities near the Salton Sea are already suffering significant and disproportionate pulmonary illness associated with chronic inhalation of dangerous particulates being emitted from exposed Salton Sea lakebed because of the QSA water transfers and other recent water cutbacks that have lowered the Salton Sea's elevation and exposed vast expanses of lakebed. For example, a recent study found that the childhood asthma rate for the portion of Imperial County closest to the Salton Sea's exposed lakebed was 22.4% in comparison to a nationwide prevalence of 8.4%.[90] The same study determined that chronic pulmonary symptoms in children not diagnosed with asthma are also unusually high in the Salton Sea region. Notably, emergency room visits for children ages 5-17 years with asthma in Imperial County are more than double the California statewide average.[91]

Because the Proposed Action will foreseeably and significantly increase the exposure and desiccation of Salton Sea lakebed and cause large additional emissions of hazardous dust, it will thereby compound the injurious and potentially irreversible consequences for public health that are already occurring. A recent study determined that "each one-foot drop in lake elevation creates, on average, $151.5 million in respiratory mortality costs in the Salton Sea counties…"[92] The proximity to the Salton Sea of environmental justice communities, including but not limited to Tribes, ensures they will be subjected to significantly worsening harm as the Proposed Action causes rapidly accelerated decline of the lake, substantially exacerbates ecosystem deterioration, and greatly increases the emission of dangerous pollutants from the exposed lakebed and the degrading lake itself into the region's air.

The Proposed Action's adverse impacts on air quality foreseeably will also worsen Imperial County's federal nonattainment status for $PM_{2.5}$ and state nonattainment status for PM_{10}, and Riverside County's federal nonattainment status for PM_{10} and state nonattainment status for $PM_{2.5}$, and will also jeopardize Imperial County's federal attainment status for PM_{10} and Riverside County's federal attainment status for $PM_{2.5}$. In so doing, the Proposed Action will violate the Clean Air Act's General Conformity requirement[93] by causing or contributing to new violations, and/or increasing the frequency or severity of existing violations, and/or

[88] The current TAC list is online at: https://ww2.arb.ca.gov/resources/documents/carb-identified-toxic-air-contaminants.

[89] For example, recent research concluded that dust from exposed Salton Sea lakebed causes lung inflammation that is distinct from the pulmonary effects of exposure to typical desert dust. Biddle, T.A. et al. (2023). Aerosolized aqueous dust extracts collected near a drying lake trigger acute neutrophilic pulmonary inflammation reminiscent of microbial innate immune ligands. *Science of the Total Environment* 858(3):159882, https://doi.org/10.1016/j.scitotenv.2022.159882.

[90] Farzan, S.F. et al. (2019). Assessment of Respiratory Health Symptoms and Asthma in Children near a Drying Saline Lake. *Int. J. Env. Res. Public Health*, 16(20):3828, https://doi.org/10.3390/ijerph16203828.

[91] https://www.cdph.ca.gov/Programs/CCDPHP/DEODC/EHIB/CPE/Pages/CaliforniaBreathingCountyAsthmaProfiles.aspx.

[92] Jones, B.A. and Fleck, J. (2020). Shrinking lakes, air pollution, and human health: Evidence from California's Salton Sea. *Science of the Total Environment* 712(22):136490, http://dx.doi.org/10.1016/j.scitotenv.2019.136490.

[93] 42 U.S.C. § 7506(c).

delaying timely attainment of federal ambient air quality standards for $PM_{2.5}$ and PM_{10} in Imperial and Riverside Counties respectively, in a manner that does not conform to the State Implementation Plan for air quality.

The Proposed Action's adverse impacts on air quality will also cause negative socioeconomic effects across the Salton Sea region that will be cumulative and significant, as well as foreseeably unmitigated. Poor air quality is associated with increased medical expenses, increased loss of work days due to illness, decreased property values, decreased tourism and visitor satisfaction, and related decreases in visitor spending levels and economic impacts on businesses.[94]

IV.E. The DEIS fails to perform the necessary analysis of the Proposed Action's harmful impacts on fish and wildlife reliant on the Salton Sea ecosystem

NEPA explicitly requires agencies to consider foreseeable adverse impacts of a proposed federal action on species listed as endangered or threatened under the U.S. Endangered Species Act, and on their habitat. Applicable law also requires agencies to consider harmful effects on other species, including but not limited to ones protected under the Migratory Bird Treaty Act[95] and various provisions of state law, in particular when the proposed action's affected environment includes "ecologically critical areas."[96] The DEIS unreasonably fails to present the legally required evaluation of pertinent issues.

The Salton Sea is a globally significant Important Bird Area (IBA) that has served as a crucial feeding, nesting, wintering, and stopover site for millions of birds of more than 400 species. For countless birds, including ones that face known threats to their continued survival, there is no other location that can substitute for their habitat in the Salton Sea ecosystem. It is foreseeable that the Proposed Action's water-use reductions will cause significant negative effects on aquatic, wetland, and riparian habitat, and will consequently cause injurious impacts on many, if not all, Special Status Species that depend on such habitat and are known to be present at the Salton Sea and around its perimeter, in wetlands and riparian areas associated with the Salton Sea and its tributaries, within IID's water service area, within CVWD's water service area, along the All-American Canal, along the Coachella Canal, and/or in other locations within the Salton Sea ecosystem. The Proposed Action will also foreseeably cause significant harm to migratory bird species covered by the protections of the Migratory Bird Treaty Act, as well as to other wildlife reliant on the Salton Sea ecosystem as "ecologically critical" habitat.[97]

The Proposed Action is ultimately very likely to cause many thousands of additional acres of Salton Sea lakebed to become exposed, beyond the areas that would otherwise have been exposed because of the QSA. Moreover, the inflow reductions resulting from the Proposed Action will substantially and rapidly increase the Salton Sea's salinity and will have other damaging impacts on water quality, all of which will degrade and foreseeably destroy the crucial lacustrine ecosystem that provides essential sustenance for fish and birds, including numerous Special Status Species. In addition, the Proposed Action's water-use reductions will result in substantial decreases in the flow of Salton Sea tributaries, including but not limited to agricultural drains and rivers that carry agricultural wastewater. The diminished flow will cause adverse impacts on aquatic, riparian, and wetland habitat; and those negative effects will result in significant injurious consequences for fish and wildlife, including Special Status Species. The failure of the DEIS to carefully and thoroughly evaluate these issues violates applicable law.

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[94] See, e.g., Tourism Economics. 2014. The Potential Economic Impact of the Salton Sea on the Greater Palm Springs Tourism Industry. https://assets.simpleviewinc.com/simpleview/image/upload/v1/clients/palmsprings/salton_sea_eis_ff17089f-eed9-4619-a89f-df859da583dc.pdf.

[95] 16 U.S.C. §§ 703-712. The list of birds protected pursuant to the MBTA is available at 50 CFR 10.13. The list was recently updated, effective August 1, 2023 (88 FR 49310).

[96] 40 CFR 1501.3(d)(2)(ii).

[97] Ibid.

Reclamation should have carefully analyzed the Proposed Action's foreseeable and significant adverse effects on all species known to be present in or likely utilizing the Salton Sea ecosystem that are listed as endangered or threatened under federal law and/or state law, and the agency should also have evaluated the foreseeable and significant negative impacts on numerous additional Special Status Species, migratory birds protected by the Migratory Bird Treaty Act, species of special conservation concern under federal and/or state law, and many other wildlife species dependent on the Salton Sea ecosystem as crucial habitat. Because Reclamation failed to conduct the required analysis, the agency must do so in a revised DEIS.

Protected avian species that are known to utilize the Salton Sea ecosystem and that foreseeably will be adversely affected by the Proposed Action include, but are not limited to, the following Special Status Species (including species designated as endangered or threatened under federal and/or state law, species proposed for listing as endangered or threatened under federal and/or state law, and species designated as of special conservation concern under federal and/or state law) and other species that are fully protected in California: Desert pupfish (*Cyprinodon macularius*), American peregrine falcon (*Falco peregrinus anatum*), American white pelican (*Pelecanus erythrorhynchos*), bald eagle (*Haliaeetus leucocephalus*), bank swallow (*Riparia riparia*), Barrow's goldeneye (*Bucephala islandica*), black tern (*Chlidonias niger*), black skimmer (*Rhynchops niger*), black tern (*Chlidonias niger*), brant goose (*Branta bernicla*), burrowing owl (*Athene cunicularia*), California black rail (*Laterallus jamaicensis coturniculus*), California brown pelican (*Pelecanus occidentalis californicus*), California gull (*Larus californicus*), Crissal thrasher (*Toxostoma crissale*), double-crested cormorant (*Nannopterum auritum*), elegant tern (*Thalasseus elegans*), elf owl (*Micrathene whitneyi)*, Gila woodpecker (*Melanerpes uropygialis*), gull-billed tern (*Gelochelidon nilotica*), laughing gull (*Leucophaeus atricilla*), least Bell's vireo (*Vireo bellii pusillus*), least bittern (*Ixobrychus exilis*), least tern (*Sternula antillarum*), Le Conte's thrasher (*Toxostoma lecontei*), lesser sandhill crane (*Grus canadensis canadensis*), long-billed curlew (*Numenius americanus*), long-eared owl (*Asio otus*), mountain plover (*Charadrius montanus*), northern harrier (*Circus cyaneus*), osprey (*Pandion haliaetus*), redhead (*Aythya americana*), short-eared owl (*Asio flammeus*), Southwestern willow flycatcher (*Empidonax traillii extimus*), summer tanager (*Piranga rubra*), vermillion flycatcher (*Pyrocephalus rubinus*), Western snowy plover (*Charadrius nivosus nivosus*), yellow warbler (*Setophaga petechia*), yellow-breasted chat (*Icteria virens*), Yuma Ridgway's rail (*Rallus obsoletus yumanensis*), white-tailed kite (*Elanus leucurus*), and wood stork (*Mycteria Americana*). Reclamation should evaluate the harmful impacts of the Proposed Action on the foregoing species in a revised DEIS.

Additionally, the DEIS fails to analyze the impacts of the Proposed Action on many other protected species, including but not limited to ones listed under the Migratory Bird Treaty Act, which depend on ecologically critical habitat in the Salton Sea ecosystem and foreseeably will be greatly harmed by the Proposed Action. Those additional species are too numerous to specify here. The necessary analysis should be performed in a revised DEIS.

IV.F. The DEIS fails to analyze the Proposed Action's impacts on biogenic greenhouse gas emissions in the central Salton Basin and associated economic costs

Significant and costly biogenic greenhouse gas (GHG) emissions that will result from exposure of the Salton Sea's lakebed and deterioration of its ecosystem because of the Proposed Action are not considered at all in the DEIS, nor are the major economic costs of those GHG emissions. Federal guidance previously applicable to NEPA analyses explicitly required that agencies "must disclose and consider…the extent to which a proposed action and its reasonable alternatives (including the no action alternative) would result in reasonably foreseeable GHG emissions that contribute to climate change."[98] Moreover, previously applicable federal guidance stated that an agency's NEPA analysis should "quantify a proposed action's projected GHG emissions…for the expected lifetime of the action," and "provide additional context for

[98] National Environmental Policy Act Guidance on Consideration of Greenhouse Gas Emissions and Climate Change (2023). Council on Environmental Quality, Executive Office of the President, January 4, 2023, Section IV.

GHG emissions, including through the use of the best available social cost of GHG (SC-GHG) estimates, to translate climate impacts into the more accessible metric of dollars, allow decision makers and the public to make comparisons, help evaluate the significance of an action's climate change effects, and better understand the tradeoffs associated with an action and its alternatives…"[99] Although the Trump administration's Council on Environmental Quality (CEQ) officially withdrew this guidance on May 28, 2025 pursuant to a broader deregulatory shift under Executive Order 14154, and although the administration has also directed agencies not to include analysis of GHG emissions and climate impacts in NEPA processes unless required by statute, the scientific basis for performing those analyses is very strong and well-established. I therefore suggest that the DEIS should have included an analysis of the significant biogenic GHG emissions, and the very large associated economic costs, that will foreseeably result from the effects of the Proposed Action on the Salton Sea and its ecosystem.

The Proposed Action's reductions in freshwater inflows to the central Salton Basin will cause large additional areas of carbon-rich Salton Sea lakebed to be exposed to the atmosphere, will push the lake into extreme hypersalinity, and will exacerbate breakdown of the lake's ecosystem. An important body of recent scientific research indicates these changes attributable to the Proposed Action will result in major quantities of biogenic greenhouse gases—including carbon dioxide, methane, and nitrous oxide—being emitted to the atmosphere on an ongoing basis for the foreseeable future unless an appropriate and effective restoration plan for the Salton Sea and its ecosystem is implemented.[100]

The biogenic GHG emissions attributable to the Proposed Action are likely to be very large. Assuming that only 40 square miles of additional Salton Sea lakebed will be exposed because of the Proposed Action (which is likely a large underestimate), and assuming that the exposed lakebed will emit only carbon dioxide and no methane or nitrous oxide (which are much more powerful greenhouse gases than CO_2 and are likely to be emitted in significant quantities from the exposed lakebed), and also assuming that there will be no other GHG emissions caused by the extremely detrimental changes to the Salton Sea and its ecosystem that will result from the Proposed Action (a conservative assumption, because it is very likely there will indeed be such additional GHG emissions), yields the conclusion that approximately 3 million metric tons of CO_2 will be emitted annually for the foreseeable future solely due to the Proposed Action.[101] This is a very conservative estimate for the quantities of ongoing GHG emissions attributable to the Proposed Action; the actual emission amounts will foreseeably be much bigger. But even 3 million metric tons of CO_2 emitted per year is a large and concerning quantity; it is equivalent to the annual emissions of 652,174 typical gas-fueled passenger vehicles.[102]

In the DEIS Reclamation also failed to consider the economic costs of the biogenic greenhouse gas emissions that will foreseeably result from the Proposed Action's negative effects on the Salton Sea and its ecosystem. The social cost of greenhouse gases (SC-GHG)—referred to more specifically in analyses performed in federal contexts as the social cost of carbon dioxide (SC-CO_2), the social cost of methane (SC-

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[99] Id., Section II.

[100] See the following peer-reviewed report and the references cited therein: Ross, J.E. (2022). Potential Major Greenhouse Gas Emissions from Proposed Salton Sea Long-Range Plans. Report submitted to the Salton Sea Long-Range Planning Committee of the Salton Sea Management Program, California Natural Resources Agency, January 27, 2022. 14 pp. https://doi.org/10.13140/RG.2.2.36775.62884. Also see the Supplementary Information for that report, explaining the possible magnitude of the greenhouse gas emissions at the Salton Sea if vast areas of lakebed are left exposed and the residual Salton Sea becomes extraordinarily hypersaline. https://doi.org/10.13140/RG.2.2.10089.36964. Numerous additional studies supporting the conclusions of the foregoing report and its supplementary information have been published since that report was prepared. In particular, a recent study of biogenic GHG emissions from the exposed lakebed of the Great Salt Lake determined the areas of lakebed that were desiccated as of 2020 emitted approximately 4.1 million tons of CO_2eq into the atmosphere during that year. Cobo, M., et al. (2024). A desiccating saline lake bed is a significant source of anthropogenic greenhouse gas emissions. *One Earth* 7(8):1414-1423, https://doi.org/10.1016/j.oneear.2024.07.001.

[101] This conclusion relies on the calculation method presented in the Supplementary Information for the report "Potential Major Greenhouse Gas Emissions from Proposed Salton Sea Long-Range Plans" (see the citation in footnote 100 above).

[102] https://www.epa.gov/greenvehicles/greenhouse-gas-emissions-typical-passenger-vehicle.

CH_4), and the social cost of nitrous oxide (SC-N_2O)[103]—is a metric that has been applied by federal agencies and some state agencies to estimate the economic costs incurred by society as a result of the emission of greenhouse gases. Prior to 2025, when President Trump told federal agencies to ignore the economic costs of GHG emissions unless required by statute to consider that issue, the SC-GHG metric was utilized across the entirety of the federal government when agencies evaluated the potential consequences of proposed policies or actions, including when conducting analyses pursuant to NEPA.[104] An evaluation of the climate impacts of proposed federal action that fails to include analysis of the SC-GHG implicitly and improperly assumes that the economic costs for society of GHG emissions, as well as the benefits of reducing those emissions, have a value of zero. It is firmly established both factually and scientifically that the actual costs and benefits are very far from zero, even for a single ton of CO_2.

The additional biogenic GHG emissions in the central Salton Basin that will foreseeably result from the Proposed Action, in combination with the large quantities of biogenic GHG emissions resulting from the QSA water transfers and from additional water cutbacks during 2024-2026,[105] could cause the associated economic costs of those GHGs to reach scores of billions of dollars in the coming years,[106] and could thwart California's efforts to attain carbon neutrality, thereby worsening climate change. I suggest the DEIS should have analyzed these reasonably foreseeable and significant adverse impacts of the Proposed Action, and should have suggested measures for avoiding such impacts or minimizing and fully mitigating them to the extent they cannot be avoided.

V. The DEIS violates the federal Indian trust responsibilities of Interior and Reclamation

Pursuant to the federal Indian trust responsibility, Interior and Reclamation have a legally enforceable fiduciary obligation and "moral obligations of the highest responsibility and trust"[107] to safeguard Tribal lands, natural and cultural resources, and other assets from damage, waste, and depletion; to protect Tribal health,

[103] U.S. EPA (2023). Report on the Social Cost of Greenhouse Gases: Estimates Incorporating Recent Scientific Advances. Available online at: https://www.epa.gov/system/files/documents/2023-12/epa_scghg_2023_report_final.pdf.

[104] The federal Interagency Working Group on the Social Cost of Greenhouse Gases (IWG) previously recognized that the social cost of greenhouse gases should apply to all "relevant agency actions," and not just regulatory ones. (Interagency Working Group on the Social Cost of Greenhouse Gases (Feb. 2021), Technical Support Document: Social Cost of Carbon, Methane, and Nitrous Oxide – Interim Estimates under Executive Order 13,990, at p.14.) The IWG also previously noted that the social cost of greenhouse gases has been used previously in NEPA analyses in particular. (Id. at p.12.) Although President Trump recently disbanded the IWG, the scientific validity of their findings and recommendations remains well-established.

[105] In the Supplementary Information for my January 2022 GHG report, cited in footnote 100 above ("the Supplementary Information"), I explained the possible magnitude of the GHG emissions involved. To derive a rough estimate, I relied on source data for a lake that is the most similar to the Salton Sea of all the lakes for which data were available. I considered only CO_2 emissions and did not include any emissions of methane or nitrous oxide. My analysis indicated that a ballpark approximation of future biogenic CO_2 emissions if vast areas of lakebed are left exposed and the residual Salton Sea becomes extraordinarily hypersaline is 26 million metric tons per year. Although that rough estimate is a very large amount, it would be reasonable to consider it to be a conservative approximation of the actual GHG emissions involved, because my calculation did not include any emissions of CH_4 or N_2O, yet those GHGs are likely to be emitted in significant quantities.

[106] To perform the necessary calculation (which very conservatively assumes that no methane or nitrous oxide will be emitted), the estimated total emissions amount in the Supplementary Information cited in footnote 100 and described in footnote 105 should be used along with data in Appendix A, section A.5, Table A.5.1 of the following reference: U.S. EPA (2023), Report on the Social Cost of Greenhouse Gases: Estimates Incorporating Recent Scientific Advances, https://www.epa.gov/system/files/documents/2023-12/epa_scghg_2023_report_final.pdf. Although in 2025 President Trump instructed federal agencies to stop taking into account the economic damage caused by climate change unless required to do so by statute, no new guidance documents have been published by EPA and the scientific validity of the agency's 2023 Report on the Social Cost of Greenhouse Gases remains well-established.

[107] Seminole Nation v. United States, 316 U.S. 286 (1942)

safety, and welfare; and to faithfully carry out other mandates of federal law with respect to Tribal lands, resources, and assets, and for the protection and benefit of Tribal members.[108]

For example, Part 512, Chapter 2 of Interior's Departmental Manual, entitled Departmental Responsibilities for Indian Trust Resources, provides in part as follows (emphasis added):

> … 2.2. Policy. **It is the policy of the Department of the Interior to recognize and fulfill its legal obligations to identify, protect, and conserve the trust resources of federally recognized Indian tribes and tribal members, and to consult with tribes on a government-to-government basis whenever plans or actions affect tribal trust resources, trust assets, or tribal health and safety.**
>
> 2.3. Responsibilities.
>
> A. **Heads of bureaus and offices are responsible for identifying any impact of Departmental plans, projects, programs or activities on Indian trust resources. Department officials shall:**
>
> **(1)** Establish procedures to **ensure that the activities of Departmental organizations impacting upon Indian trust resources are explicitly addressed in planning, decision, and operational documents…**
>
> 2.4. Procedures.
>
> A. Reports. **As part of the planning process, each bureau and office must identify any potential effects on Indian trust resources. Any effect must be explicitly addressed in the planning/decision documents, including,** but not limited to, Environmental Assessments, **Environmental Impact Statements**, **and/or Management Plans prepared for the project or activity.** The documentation shall:
>
> (1) Clearly state the rationale for the recommended decision; and
> (2) Explain how the decision will be consistent with the Department's trust responsibility.
>
> B. Consultation. **In the event an evaluation reveals any impacts on Indian trust resources, trust assets, or tribal health and safety, bureaus and offices must consult with the affected recognized tribal government(s),** the appropriate office(s) of the Bureau of Indian Affairs, the Office of the Solicitor, and the Office of American Indian Trust. Each bureau and office within the Department shall be open and candid with tribal government(s) during consultations so that the affected tribe(s) may fully evaluate the potential impact of the proposal on trust resources and the affected bureau(s) or office(s), as trustee, may fully incorporate tribal views in its decision-making processes.

In addition, Part 303, Chapter 2 of Interior's Departmental Manual, entitled Principles for Managing Indian Trust Assets, provides in part as follows (emphasis added):

> 2.7 Trust Principles. **It is the policy of the Department of the Interior to discharge, without limitation, the Secretary's Indian trust responsibility with a high degree of skill, care, and loyalty. The proper discharge of the Secretary's trust responsibilities requires that persons who manage Indian trust assets:**
>
> A. **Protect and preserve Indian trust assets from loss, damage, unlawful alienation, waste, and depletion**…
>
> …
>
> M. **Protect treaty-based fishing, hunting, gathering, and similar rights of access and resource use on traditional tribal lands.**

[108] Department of the Interior, Departmental Manual, Part 303, Chapter 2, and Part 512, Chapter 2.

Reclamation's failure in the DEIS to identify, explicitly evaluate, and commit to minimizing and fully mitigating the foreseeable and significant impacts of the Proposed Action on Tribal lands, natural and cultural resources and other assets on those lands, as well as on Tribal health, safety, and welfare, violates the federal Indian trust responsibility and related statutes, regulations, case law, and policies.

The Desert Cahuilla Indians have lived in the northern Salton Trough for many thousands of years, and throughout that time have relied upon traditional Tribal lands and other cultural and natural resources and assets in the central Salton Basin, including but not limited to: large lakes; their shorelines, wetlands, and tributaries; associated wildlife, such as fish and birds; associated plants; and the area's groundwater and springs. The Desert Cahuilla also created and utilized culturally important sites, structures, and objects (e.g., stone fish traps and walk-in wells) for traditional Tribal activities in the Salton Basin related to the foregoing Tribal lands and other natural and cultural resources and assets.

The Tribal reservation lands of the Torres Martinez Desert Cahuilla Indians, a federally recognized Tribe, total approximately 24,000 acres directly adjoining the Salton Sea and its increasingly exposed lakebed, and also include regions of the lake itself, as well as areas that were previously within the lake but are now part of the exposed lakebed. Foreseeable and significant negative impacts of the Proposed Action affecting the lands, natural and cultural resources, and other assets of the Torres Martinez Tribe, and the health, safety, and welfare of Tribal members include, but are not limited to: hazardous, toxic, and carcinogenic dust blowing off of the Salton Sea's increasingly exposed lakebed as the Salton Sea shrinks from freshwater deprivation; toxic algae blooms in the lake and in associated wetlands and tributaries, and hazardous microbial components emanating from toxic algae blooms in the form of aerosol particles and droplets; noxious hydrogen sulfide gas being emitted from the lake and its marshes as the Salton Sea's water quality and ecosystem deteriorate; and the death and disappearance of originally profuse fish and bird populations.[109] It is foreseeable that all those injurious effects will be substantially exacerbated if the Proposed Action is implemented.

In the DEIS Reclamation should have: (a) fully evaluated the reasonably foreseeable types of harm that may result from the Proposed Action and adversely affect the lands, natural and cultural resources, and other assets of the Torres Martinez Tribe, and the health, safety, and welfare of Tribal members; b) consulted with the Torres Martinez Desert Cahuilla Indians concerning the Proposed Action, the details of the foreseeable harm that may affect the Tribe and its resources, and potential mitigation measures; and (c) committed to minimize and fully mitigate the harmful impacts of the Proposed Action on the Tribe.

Interior and Reclamation have failed to satisfy their legally enforceable Indian trust obligations with respect to injurious impacts on the Torres Martinez Desert Cahuilla Indians that are reasonably foreseeable effects of the Proposed Action.[110] The agencies have not consulted with the Torres Martinez Tribe regarding these specific issues in the manner required.[111] In addition, Reclamation has not presented an analysis in the DEIS of the foreseeable harmful effects of the Proposed Action on the lands, natural and cultural resources, and other assets of the Torres Martinez Tribe, or on the health, safety, and welfare of Tribal members; and Reclamation has not committed to minimizing and fully mitigating the harm to the Tribe that will foreseeably result from the Proposed Action. Reclamation's failure to discharge these duties violated the agency's Indian trust responsibility and applicable law.[112] This indefensible breach of Reclamation's and Interior's legally enforceable obligations must be fully remedied in a revised DEIS.

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[109] This recitation of harmful impacts on the Torres Martinez Desert Cahuilla Indians is not intended to be exhaustive.

[110] Reclamation may also have violated the agency's Indian trust responsibility with regard to other Tribes in the Salton Sea region.

[111] Salton Sea Authority (February 27, 2026). Public comments on the Draft Environmental Impact Statement (EIS) Post-2026 Operational Guidelines and Strategies for Lake Powell and Lake Mead, page 6. Available at: https://saltonsea.com/wp-content/uploads/2026/02/SSAComments_CRBPost2026EIS.pdf. The Torres Martinez Tribe is represented on the Board of the Salton Sea Authority, and is a signatory on the cited comment letter.

[112] Please note that I do not represent or speak on behalf of the Torres Martinez Desert Cahuilla Indians or any other Tribe. I offer these comments solely as a concerned citizen and as someone who has extensive knowledge about matters

VI. Cumulative and significant Salton Sea Impacts will foreseeably be devastating if Reclamation proceeds with the Proposed Action while failing to ensure those harmful consequences are avoided or minimized and fully mitigated

VI.A. Summary of cumulative and significant Salton Sea Impacts that will greatly harm fish and wildlife, the regional environment, the climate, and people throughout the Salton Sea area

In the DEIS, Interior and Reclamation should have carefully considered all of the following cumulative and significant Salton Sea Impacts, and other harmful consequences in the Salton Sea region, that foreseeably will result from the Proposed Action. Interior and Reclamation must properly evaluate all these impacts of the Proposed Action, and other adverse consequences, in a revised DEIS. This discussion is not intended to be an exhaustive itemization of all foreseeable, cumulative, and significant Salton Sea Impacts.

- Major decreases in the volume, depth, and surface area of the Salton Sea will occur. The resulting harmful impacts will include, but may not be limited to, dangerously degraded water quality, loss of habitat for fish and wildlife, associated injurious biological and ecological consequences, and exposure of vast areas of additional Salton Sea lakebed.

- Huge additional quantities of hazardous particulates (PM_{10} and $PM_{2.5}$) originating from the exposed Salton Sea lakebed will be chronically emitted into the region's atmosphere, fouling air quality and greatly endangering public health. Harmful dust and aerosol droplets will be released from exposed lakebed and from the deteriorating Salton Sea, as well as from other degrading waterbodies in the Salton Sea ecosystem suffering from freshwater deprivation. The particulates are known to contain dangerous, toxic, and carcinogenic constituents, including but not limited to heavy metals, PCBs, and residues of banned pesticides that would otherwise be sequestered in undisturbed sediments beneath the waters of the Salton Sea. Microcystins and other toxins derived from harmful algae blooms that pose inhalation, ingestion, and dermal-contact hazards will also very likely be components of dust emitted from the exposed lakebed, and in the aerosol droplets discharged from the shriveling lake and other waterbodies. *Coccidioides* spores, which cause potentially fatal coccidioidomycosis (Valley Fever), and other hazardous microbial materials are foreseeably present in the dust and aerosol droplets as well. Dangerous emissions of particulates from exposed lakebed will occur on an ongoing basis regardless of dust mitigation activities, because such measures can somewhat reduce the problem but cannot eliminate it.

- Greatly worsened public health threats will cause increased morbidity and mortality.[113] More than half a million people throughout the region adjacent to the Salton Sea—including Tribes and other disadvantaged communities—will be obliged to breathe hazardous, toxic, and carcinogenic particulates emitted into the region's air from exposed Salton Sea lakebed, and to suffer ongoing exposure to toxins from harmful algae blooms, other dangerous microbial materials being emitted from the degraded Salton Sea and associated deteriorating waterbodies, and increasing releases of noxious fumes, such as hydrogen sulfide. It is foreseeable that serious diseases and fatalities will consequently occur.

- There will be rapid and significant increases in the salinity of the residual Salton Sea, as well as other negative effects on water quality, including but not limited to decreases in dissolved oxygen and increased concentrations of hazardous contaminants. The residual Salton Sea will eventually be

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related to the past, present, and future of the Salton Sea and associated issues affecting people throughout the surrounding region, including but not limited to Tribes.

[113] See the discussion in Part IV.D. above, and the references cited in footnotes 30, 31, 32, 33, 34, and 92.

pushed into a state of extreme hypersalinity in which the lake will be ecologically useless and incapable of supporting any organisms other than halophilic bacteria, archaea, viruses, and other microorganisms—many of which may be harmful to wildlife and people.

- The remaining Salton Sea fish and invertebrates—which have provided an essential food supply for millions of migratory and resident birds—will be extirpated in the residual lake as a result of physiologically intolerable salinity levels, and potentially in part because of other adverse impacts on water quality. They will also likely be extirpated from some, if not all, associated wetlands and tributaries as those waterbodies are adversely affected by freshwater deprivation.

- Rapid deterioration and loss of crucial habitat for hundreds of species of birds will foreseeably occur. In particular, there will likely be loss of essential habitat for millions of migratory birds that depend on the Salton Sea ecosystem during twice-yearly migrations, and that have no other appropriate resting and feeding locations in a vast arid region as they travel enormous distances. Most or all essential aquatic habitat will be lost.

- Crowding of birds in remaining usable areas of habitat is likely to enhance avian disease transmission, cause outbreaks that are difficult to control, and result in major die-offs of birds.

- There will be greatly increased threats to the continued existence of migratory and resident avian species that are already designated as endangered, threatened, or of special concern under federal and/or state law and that depend on the Salton Sea ecosystem for resting, feeding, and/or breeding.

- Also in jeopardy will be the continued survival of the desert pupfish (*Cyprinodon macularius*), which is already designated as an endangered species under the U.S. Endangered Species Act and California law, and is reliant on the Salton Sea ecosystem.

- Threats to the health and survival of numerous species will result from increased contact with and ingestion of contaminated sediments in exposed Salton Sea lakebed, and hazardous substances in polluted tributary water that will flow undiluted across expanses of exposed lakebed and attract wildlife. In addition, the food web will be affected by potentially dangerous biomagnification of some pollutants.

- Exposure and drying of portions of the central region of the Salton Sea lakebed will pose additional and particularly significant threats to wildlife and people. Ongoing research has established that elevated levels of hazardous, toxic, and carcinogenic contaminants are highest in Salton Sea sediments within the central region of the lakebed.[114] It is therefore foreseeable that exposure of central lakebed areas and emission of fugitive dust from them will result in particularly consequential adverse impacts on air quality and public health. In addition, because the most contaminated lakebed areas will be exposed adjoining the residual Salton Sea, it is also likely there will be increased harmful effects on wildlife drawn to the remaining water.

- Major quantities of greenhouse gases—including carbon dioxide, methane, and nitrous oxide—will come from numerous biogenic sources within the original Salton Sea footprint. The biogenic GHG emissions will come from a variety of sources, including but not limited to: vast areas of exposed lakebed (including dry lakebed sediments, intermittently rewetted sediments, and sediments that are disturbed—e.g., by furrowing for dust control); tributary streams dispersing across large expanses of exposed lakebed; and the residual Salton Sea as it becomes extremely hypersaline.[115] The quantities of the GHG emissions could be so large they will undermine federal and state statutory and policy

[114] Statements by Dr. Timothy Lyons (University of California, Riverside) during the May 16-17, 2023 California State Water Resources Control Board workshop on the Salton Sea. (Video of the workshop is available online at: https://www.waterboards.ca.gov/board_info/video.html. Dr. Lyons speaks during Panel 4 on May 17.)

[115] See the report and other information cited in footnote 100.

objectives related to achieving net-zero emissions, and will worsen climate change.[116] In addition, the potentially enormous scale of the GHG emissions involved could ultimately result in the cumulative economic cost of those emissions reaching at least scores of billions of dollars—and possibly much greater amounts—during the coming decades.[117]

- Areas of the Salton Sea lakebed containing unexploded ordnance (UXO), which was dropped into the lake during wartime military training activities in the 1940s and 1950s, are likely to be exposed as the Salton Sea shrinks. Exposure of UXO could pose significant public safety risks. None of the UXO risk areas is expected to be cleaned up by the Department of Defense until after 2028, and most will not be remediated until 2038 or much later.[118]

- All aspects of the economy across the Salton Sea region will suffer negative impacts because of deteriorating environmental conditions and increasing threats to public health, fish, and wildlife. The adverse effects will include, but will not be limited to, major economic harm to all types of businesses and industries, decreased property values, lost work days, increased medical expenses, and loss of tourism.

- The region's important agricultural industry will be negatively affected by threats to the health of workers from hazardous, toxic, and carcinogenic airborne particulates, and by deposition onto crops of damaging salt particles and contaminants blown from increasing areas of exposed Salton Sea lakebed. These impacts on agriculture will compound the negative economic effects throughout the region that will be caused by the loss of large quantities of Colorado River water needed for irrigation, and by the related fallowing of farm fields, decreased crop production, reduced employment, and diminished income for farmers and businesses associated with agriculture.

- Significant adverse impacts on the environment in the Salton Sea region will foreseeably affect major military installations and impair essential military operations, with potential negative consequences for military readiness and national security. Worsening dust storms containing dangerous particulates emanating from the central Salton Basin will impact the functions of the El Centro Naval Air Facility (NAS El Centro) in Imperial County, because flights to and from NAS El Centro will be grounded during major dust storms within the Salton Basin. Potential harmful health effects on military personnel are also foreseeable. In addition, critical military air operations at the Chocolate Mountain Aerial Gunnery Range (CMAGR) will be negatively affected by large quantities of fugitive dust from exposed Salton Sea lakebed. The CMAGR is located adjacent to the Salton Sea, to the east and southeast of the lake, and is in the direct path of hazardous particulates blown from exposed lakebed by prevailing winds.[119]

- Unsafe air quality in the central Salton Basin could jeopardize commercial-scale lithium extraction, an emerging industry that is anticipated to be central for U.S. efforts to develop renewable energy and fight climate change in the coming years. Chronic impairment of air quality with hazardous particulates containing toxic and carcinogenic constituents will likely be worst in the area where lithium extraction and processing facilities must be located, within the Salton Sea Geothermal Field near the southeast shore of the Salton Sea. Prevailing winds blowing across the exposed lakebed and the residual, degraded Salton Sea will push airborne pollutants directly into that area. It is foreseeable that dangerous air quality will impair the ability of the lithium industry to attract the

[116] See the information in footnote 105.

[117] See the information in footnote 106.

[118] Final Environmental Assessment/Combined Decision Document for the Salton Sea Management Program (SSMP) Phase 1: 10-Year Plan (2024), Appendix 1, Table 4-27. https://www.spl.usace.army.mil/Missions/Regulatory/Projects-Programs/Salton-Sea-Management-Plan/.

[119] Similar problems previously afflicted Naval Air Weapons Station China Lake in the western Mojave Desert region of California because of dust storms emitted from desiccated Owens Lake. Frequent and extremely costly cessation of important military activities was necessary due to unsafe air quality and impaired visibility.

large numbers of skilled workers it will require, and will adversely affect the health of those who choose to work at the necessary facilities near the shriveling and deteriorating Salton Sea.

- Major shrinkage of the Salton Sea plus foreseeable curtailment of irrigated agriculture in the Imperial Valley (and in the Coachella and Mexicali Valleys) will negatively affect Salton Trough climate and hydrology, and possibly climate and hydrology in other areas of the Colorado River Basin as well.[120] Very large decreases in the previously immense quantities of water vapor injected into the regional atmosphere by evaporation from the full Salton Sea's surface, and reduced evapotranspiration from areas of irrigated crops due to constraints on Colorado River water allocations, will engender hotter ambient temperatures and dryer hydrologic conditions across the region. It is foreseeable that those effects will in turn cause negative impacts on public health and wildlife, as well as on agricultural production and other aspects of the regional economy. In addition, a detrimental feedback effect could result from the higher temperatures and drier hydrology related to the lake's shrinkage, causing further decreases in water availability, lower inflows to the central Salton Basin, additional decline of the residual Salton Sea, and even hotter and drier climate conditions.

- The Proposed Action will foreseeably result in violations of federal and state statutes, regulations, and policies related to air quality, water quality, threatened and endangered species, climate, occupational safety and health, food safety, and other important matters administered and enforced by government entities. The federal statutes that are likely to be violated include, but are not limited to, the Clean Air Act, the Clean Water Act, and the Endangered Species Act.

VI.B. Reclamation cannot properly rely on the SSMP 10-Year Plan and the USACE's ISSS Study to address Salton Sea Impacts of the Proposed Action

In the DEIS, Reclamation relies on the State of California's SSMP 10-Year Plan[121] and the ISSS Study being performed by the U.S. Army Corps of Engineers as the sole measures to avoid, or minimize and fully mitigate, all harmful Salton Sea Impacts of the Proposed Action. That reliance is seriously misplaced. Those state and federal activities are important but are clearly insufficient even to address the harm currently affecting the Salton Sea ecosystem, fish and wildlife, the environment, and people as a result of the QSA water transfers and additional recent water cutbacks; they will be grossly inadequate to avoid, or minimize and fully mitigate, the greatly exacerbated crisis that will result from Reclamation's Proposed Action.

VI.B.1. The SSMP 10-Year Plan is insufficient for avoiding or mitigating the harmful impacts of the Proposed Action

As explained in Part II above, the SSMP is lagging extremely far behind in its attempted compliance with the SWRCB Stipulated Order that mandates a specific time-table during 2018-2028 for implementation of habitat creation and dust suppression measures pursuant to the 10-Year Plan. Consequently, it is clear that completion of the 10-Year Plan will not occur by 2028 as required, and in fact the SSMP's activities will fall very far short of creating the minimum required grand total of 29,800 acres of habitat and dust suppression measures that must be finished and operational by then. In addition, the significant funding necessary to build and operate the components of the 10-Year Plan has not been secured, and various other essential

[120] See, e.g., Lo, M. and Famiglietti, J. S. (2013). Irrigation in California's Central Valley strengthens the southwestern U.S. water cycle. *Geophysical Research Letters* 40: 301–306. https://doi.org/10.1002/grl.50108.

[121] Final Environmental Assessment/Combined Decision Document for the Salton Sea Management Program (SSMP) Phase 1: 10-Year Plan (2024), https://www.spl.usace.army.mil/Missions/Regulatory/Projects-Programs/Salton-Sea-Management-Plan/.

preconditions for executing the plan have not been met. Therefore, full implementation of the 10-Year Plan, even belatedly, is not guaranteed.

Moreover, it is becoming increasingly clear that major components of the 10-Year Plan will not be implemented at all due to a lack of feasibility, and—at best—other much smaller and less effective components are likely to be substituted for them. For example, the original proposed plans for the "North Lake Pilot Demonstration Project" and the "North Lake Project"—the 10-Year Plan's largest projects in the northern portion of the Salton Sea's original footprint that were designed to create aquatic habitat and cover emissive lakebed—will not be implemented, because geotechnical assessments have determined they are infeasible for fundamental reasons, including but not limited to inadequate available water and unsafe levels of seismic risk.[122] Although the SSMP is currently considering alternatives to the original, infeasible projects, it is apparent that none of the potential alternatives will provide the types and extent of habitats previously envisioned, and will also not provide dust suppression across the expanses of exposed Salton Sea lakebed intended to be covered by the projects as originally formulated.[123]

Even if it is assumed that the rest of the 10-Year Plan, apart from the North Lake Pilot Demonstration Project and North Lake Project, will actually be implemented in the future, realistically it appears that will not occur for at least several years beyond 2028. Furthermore, even if a partial 10-Year Plan is belatedly implemented, it will not prevent fish and wildlife, the environment, the climate, and people throughout the Salton Sea region from suffering severe and potentially irreparable harm from the Proposed Action in the future. The limited 10-Year Plan components will not be adequate to restore the habitats necessary for permanently supporting the number and variety of wildlife species, including threatened and endangered ones, originally reliant on the Salton Sea ecosystem—as required by California's Salton Sea Restoration Act.[124] In addition, the partial and belatedly implemented 10-Year Plan will also not be sufficient to prevent a variety of other harmful impacts resulting from the Proposed Action, including but not limited to: (a) large, ongoing emissions of hazardous, toxic, and carcinogenic particulates from exposed lakebed and the deteriorating Salton Sea itself; (b) serious harm to human health across a large region; (c) major greenhouse gas emissions from vast areas of exposed lakebed, the residual exceedingly hypersaline Salton Sea, and relatively small and shallow impoundments; and (d) enormous economic costs resulting from all of the foregoing types of harm.

VI.B.2. The activities of the USACE related to the ISSS Study will not adequately address the harmful impacts of the Proposed Action

The USACE's ISSS Study is a multi-year feasibility study initiated in 2023 that is exploring various proposed options for partial revitalization or full restoration of the Salton Sea. The ISSS Study is currently at a very early stage, and is not fully funded.[125] In addition, as explained in Part II above, the Corps is severely

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[122] Salton Sea Authority Board Meeting, November 20, 2025, agenda item IV.F.1. A video recording of the meeting is available at: https://saltonsea.com/events/salton-sea-authority-board-of-directors-meeting-11-20-2025/

[123] Ibid.

[124] California Fish and Game Code Chapter 13, Sections 2930 et seq. Restoration of the Salton Sea has become even more crucial recently because the Great Salt Lake is also shrinking, and its ecosystem is also collapsing, from freshwater deprivation. The demise of both lakes would imperil the continued survival of millions of migratory birds, including threatened and endangered species.

[125] Statements by Corrie Stetzel, USACE Water Resources Planner, and Patrick O'Dowd, Executive Director/General Manager of the Salton Sea Authority, during the Salton Sea Authority Board Meeting on November 20, 2025, agenda item IV.C. A video recording of the meeting is available at: https://saltonsea.com/events/salton-sea-authority-board-of-directors-meeting-11-20-2025/. See also: https://www.spl.usace.army.mil/Missions/Civil-Works/Projects-and-Studies/Imperial-Streams-Salton-Sea/; and Salton Sea Authority, February 27, 2026 public comments on the Draft Environmental Impact Statement (EIS) Post-2026 Operational Guidelines and Strategies for Lake Powell and Lake Mead, available at: https://saltonsea.com/wp-content/uploads/2026/02/SSAComments_CRBPost2026EIS.pdf.

hampered in conducting the ISSS Study because of major jurisdictional constraints, as well as additional self-imposed limitations on the scope and details of its feasibility study. Moreover, it is presently anticipated that—even assuming full funding for the ISSS Study becomes available in the near future—the study will not be completed (to the final stage of the USACE process, which is issuance of a Chief's Report) until the end of calendar year 2029, at which point approval of, and funding for, the recommended project will still need to be sought from Congress in order to accomplish the project.[126] Even assuming Congressional approval and funding for project implementation will ultimately be obtained, subsequently it will likely take years to complete the project and render it fully operational. Therefore, the activities of the USACE related to the ISSS Study will have no effect on the harmful impacts of the Proposed Action until long after 2030.

Furthermore, depending on the details of the USACE project selected for ultimate implementation, that project may or may not actually be effective in very belatedly addressing the harmful consequences of the Proposed Action. As noted above and explained in Part II, the USACE's jurisdictional constraints and self-imposed subject-matter limitations for the ISSS Study may fundamentally cripple the ability of the Corps to design and implement an appropriate, effective, and sustainable project. In addition, if an in-basin project dependent on Colorado River wastewater is selected as the project the Corps will implement, it will suffer from the significant, inherent, and potentially fatal problems described in Part VII.A. below, and consequently it will not avoid, or even effectively mitigate, the harm to people, fish and wildlife, the environment, and the climate that will result from the Proposed Action. In fact, the project may even fail completely because the Colorado River water necessary to sustain it is not available, or for other reasons. On the other hand, even if an ocean water importation plan for full restoration of the Salton Sea is selected for implementation by the USACE as the result of the ISSS Study—which currently appears very unlikely in light of the major jurisdictional constraints affecting the work of the Corps, in combination with the USACE's self-imposed limits on the scope and details of its study—realistically such a project will not be approved, funded, and implemented in time to avert the many types of significant harm that foreseeably may result quickly from the Proposed Action.

There will be devastatingly harmful consequences if the Proposed Action is implemented and the selected USACE project is not ultimately approved and funded by Congress, or the USACE selects an in-basin project for implementation and that project fails because the necessary Colorado River water is not available, or is unsuccessful for other reasons. In that case, the partial, belated, and seriously inadequate 10-Year Plan components would be the only measures implemented for revitalization or restoration of the Salton Sea ecosystem, and the harmful consequences would be dire. The consequences would be even more devastating if the partial 10-Year Plan also fails because of a lack of Colorado River water or for other reasons. People, wildlife, the environment, and the climate will suffer catastrophic harm as the residual deteriorating Salton Sea becomes ecologically useless and hazardous, huge quantities of toxic and carcinogenic particulates chronically spew from the exposed lakebed and the degenerated residual lake, and major quantities of biogenic greenhouse gases are emitted from all across the central Salton Basin within the Salton Sea's original footprint. This scenario is entirely foreseeable.

It is incumbent on Interior and Reclamation to identify and commit to implementing effective measures for avoiding, or minimizing and fully mitigating, the harmful Salton Sea Impacts that are reasonably foreseeable consequences of the Proposed Action. Interior and Reclamation must do so in a revised DEIS without making any assumptions about the implementation or effectiveness of the 10-Year Plan or the USACE ISSS Study.

[126] Statements by Corrie Stetzel and Patrick O'Dowd during the November 20, 2025 Salton Sea Authority Board Meeting, supra. The USACE and the Salton Sea Authority currently anticipate, as explained by Ms. Stetzel and Mr. O'Dowd, that the project selected for implementation by the USACE as a result of the ISSS Study will be authorized by Congress in the 2030 cycle of the Water Resources Development Act, and subsequently funded by an appropriations bill.

VII. To avert devastating consequences of the Proposed Action, permanent restoration of the Salton Sea is necessary

In order to avoid, or effectively minimize and fully mitigate, the cumulative and significant harmful impacts of the Proposed Action, it is essential for Interior and Reclamation to develop and undertake actions that will result in permanent restoration of the Salton Sea ecosystem. I suggest this should be accomplished as part of the Post-2026 Program, in consultation or collaboration with the U.S. Army Corps of Engineers and other federal and state agencies as appropriate.[127] As explained above, the ongoing ISSS Study by the Corps is severely hampered by fundamental jurisdictional constraints, as well as by self-imposed limitations related to reliance on the SSMP's inadequate and scientifically unsound Long-Range Plan,[128] including but not limited to reliance on the biased and fatally flawed analysis, findings, and conclusions of the U.C. Santa Cruz panel[129] that the SSMP incorporated into the Long-Range Plan. Therefore, in order to effectively address the harmful consequences of the Proposed Action, it is necessary for Interior and Reclamation to engage with the USACE and other federal and state agencies to ensure that appropriate and permanent restoration of the Salton Sea is accomplished. If Interior and Reclamation need additional authorities in order to perform the necessary activities, they should immediately pursue obtaining those authorities.

Numerous long-term plans have been proposed to address the Salton Sea crisis and revitalize or restore the lake and the Salton Sea ecosystem in different ways and to varying degrees. The proposed plans fall into two general categories: (a) in-basin plans that use only the water already available as inflow into the central Salton Basin, nearly all of which is a shrinking supply of Colorado River wastewater,[130] to create impoundments on the exposed Salton Sea lakebed for habitat and recreation; and (b) ocean water importation plans, which propose to refill the Salton Sea and restore its ecosystem either by using desalinated ocean water (imported from either the Gulf of California or the Pacific Ocean), or by using imported ocean water that is not desalinated, in combination with some sort of outflow mechanism to prevent salts from continuing to accumulate in the lake.[131]

VII.A. In-basin restoration options

1. Proposed in-basin restoration plans, which are more accurately described as partial revitalization options, all rely on huge amounts of Colorado River wastewater flowing into the central Salton Basin to fill large earthen impoundments constructed on the Salton Sea's exposed lakebed to create habitat areas and recreational opportunities. The sizes and configurations of the impoundments vary from one proposed in-basin plan to another; however, all plans use excavated lakebed sediments to construct the impoundments and other features such as levees and causeways, and all plans use Colorado River wastewater to fill the impoundments. In-basin plans also employ dust mitigation measures on other portions of the exposed lakebed (e.g., deep

[127] For example, it may also be appropriate or necessary for the International Boundary and Water Commission to be involved.

[128] See my detailed public comments submitted to the CNRA and SSMP regarding the 2023 SSMP Draft Long-Range Plan, available at: https://doi.org/10.13140/RG.2.2.33676.37768.

[129] See my detailed public comments submitted to the CNRA and SSMP regarding the work of the U.C. Santa Cruz panel, available at: https://doi.org/10.13140/RG.2.2.30320.93448.

[130] As Interior and Reclamation are aware, a relatively small portion of the inflow into the central Salton Basin comes from local tributaries, groundwater, and stormwater. The rest is Colorado River wastewater, most of which derives from Imperial County's agricultural use of IID's allotment of the river's water, as noted above. Additional inflow is wastewater from agricultural, municipal, and industrial use of Colorado River water in the Coachella Valley and northwest Mexico.

[131] For purposes of these comments, "ocean water importation," "seawater importation," "the use of ocean water" to restore the Salton Sea, and other similar phrases mean any restoration plan using either of those two general approaches. Many ocean water importation plans of those two types have been proposed during the past few decades.

furrowing to inhibit airborne movement of particles), and they include at least one large brine sink in the central basin that is incapable of supporting fish or wildlife.

2. The dependence of in-basin plans on the continued availability of enormous volumes of Colorado River wastewater flowing annually into the central Salton Basin in perpetuity is exceedingly problematic if not completely untenable.[132] Worsening climate change, significantly decreasing Colorado River streamflow,[133] and tightening restrictions on use of the river's water will jeopardize the existence of the inflow amounts required by in-basin plans, and will threaten the efficacy and sustainability of all such plans. Consequently, all in-basin plans will face a substantial risk of failure if implemented. In the event that a very costly in-basin plan is ineffective or becomes inoperable because of water constraints, enormous amounts of money will have been wasted, and the devastating consequences for wildlife, people, the environment, and the climate will be tantamount to the dire impacts of a no-action scenario. Although permanent restoration conceivably could be accomplished using an in-basin plan if a very large annual amount of Colorado River water is specifically and irrevocably allocated to the Salton Sea, that approach is clearly infeasible because of the many legitimate and competing demands for the river's over-allocated and declining water supply.

3. In addition to their problematic and likely unsustainable dependence on the use of Colorado River water, all in-basin plans suffer from many other significant inherent flaws that render them seriously inadvisable and undermine their viability. For example:

    a. Wastewater containing dangerous pollutants will be relied upon as the sole water source for impoundments to be used as habitat and for recreational activities, exposing both wildlife and people to known and serious risks of harm. The hazardous, toxic, and carcinogenic pollutants in the water include, but are not limited to, pesticide residues (from both banned legacy pesticides such as DDT and ones in current use), heavy metals (e.g. arsenic, lead, chromium, nickel, and cadmium), polychlorinated biphenyls (PCBs), components of untreated wastewater crossing the international border from Mexico (potentially including pathogens), various industrial chemicals released from Mexican factories, microcystins from harmful algae blooms, and elevated levels of selenium.

    b. Lakebed and deltaic sediments contaminated with hazardous, toxic, and carcinogenic substances, including but not limited to the ones noted above, will be excavated and used to create and maintain impoundments, dikes, levees, islands for wildlife to nest and loaf, and other earthen structures such as causeways and embankments to be used by people (e.g., for driving, hiking, birdwatching, fishing, and launching boats). Through a variety of exposure pathways, the contaminants in sediments will pose known risks of significant harm to both wildlife and people.

    c. The essential components of in-basin plans, including but not limited to impoundments, dikes, levees, causeways, and other infrastructure, will be constructed on the Salton Sea lakebed on top of or adjacent to significant active faults and seismic zones. In the event of a large earthquake (which is highly likely to happen during the life of a long-term restoration plan), major ground motion and extensive liquefaction of sediments in the Salton Sea footprint will occur, and will likely cause critical infrastructure built on top

[132] The amount of inflow required by in-basin plans varies among the proposed restoration concepts. The minimum quantity necessary for the in-basin concept with the smallest water requirement, taking into account the effects of climate change in the coming decades, is approximately several hundred thousand acre-feet per year. Other proposed in-basin plans require, roughly, as much as double that amount. Importantly, the suggested concepts with lower water requirements necessarily entail leaving much greater expanses of lakebed exposed, and they will therefore result in significantly larger emissions of hazardous fugitive dust and biogenic greenhouse gases from the exposed lakebed on an ongoing basis.

[133] For example, see the studies cited in footnotes 11 and 12.

of the lakebed to be incapacitated and destroyed. Levees, dikes, and causeways will be cut by shearing forces causing co-seismic displacements of as much as 6 meters,[134] impoundments will collapse, and access roads on the lakebed will be disabled. Such a dangerous scenario will pose major threats to public safety, and will necessitate rebuilding the project—which might not even be feasible.

d. Huge quantities of dangerous particulates (PM_{10} and $PM_{2.5}$) in the form of dust and aerosol droplets containing hazardous, toxic, and carcinogenic components will be emitted from vast areas of lakebed that will be left exposed by in-basin plans, and will also be released from the residual, degraded Salton Sea. The chronic emissions will negatively affect regional air quality and endanger the health of roughly 600,000 people throughout the surrounding region (and potentially a significantly greater number, including the populations of western Riverside County and Los Angeles County in California, Yuma County in Arizona, and the city of Mexicali in Mexico).

e. Major quantities of greenhouse gases—including carbon dioxide, methane, and nitrous oxide—are likely to be emitted on an ongoing basis for the foreseeable future from exposed Salton Sea lakebed and other features of in-basin restoration plans.[135] The quantities of biogenic GHG emissions involved could ultimately be so large that California's plan to attain net-zero carbon emissions will be derailed, and climate change will be worsened.[136]

f. The economic cost of the biogenic GHG emissions (SC-GHG) associated with in-basin plans that leave vast areas of lakebed exposed and include other components that are also likely to emit major quantities of GHGs on an ongoing basis is likely to reach at least scores of billions of dollars during the life of a long-term restoration plan, and could soar far higher than that.[137]

g. The inhabited region adjacent to the Salton Sea—the area that will be most negatively impacted if an ineffective and/or unsustainable in-basin restoration plan is implemented—encompasses disadvantaged populations bearing major burdens of environmental injustice.[138] The people living and working there are already adversely

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[134] See, e.g., Kyriakopoulos, C., et al. (2019). Dynamic Rupture Scenarios in the Brawley Seismic Zone, Salton Trough, Southern California. *JGR Solid Earth* 124(4), 3680-3707, https://doi.org/10.1029/2018JB016795.

[135] See the report and other information cited in footnote 100 above.

[136] A rough ballpark estimate of the total quantities of GHG emissions involved is the amount calculated in the Supplementary Information referenced and described in footnotes 100 and 105 above—i.e., 26 million metric tons of CO_2 annually.

[137] The relevant calculation is performed using estimated emissions amounts and the data in Appendix A, section A.5, Table A.5.1 of the following report: U.S. EPA (2023). Report on the Social Cost of Greenhouse Gases: Estimates Incorporating Recent Scientific Advances, https://www.epa.gov/system/files/documents/2023-12/epa_scghg_2023_report_final.pdf. Although in 2025 President Trump instructed federal agencies to stop taking into account the economic damage caused by climate change unless required to do so by statute, no new guidance documents have been published by EPA and the scientific validity of the agency's 2023 Report on the Social Cost of Greenhouse Gases remains well-established.

[138] The Council on Environmental Quality's Climate and Environmental Justice Screening Tool (CEJST) identifies the locations and extent of disadvantaged communities, including but not limited to Federally Recognized Tribes, and shows that the entire Salton Sea region consists of such populations. CEQ developed the CEJST as required by Executive Order 14008. It is a geospatial mapping tool that federal agencies have been directed to use "to identify disadvantaged communities. These communities have been marginalized by society, overburdened by pollution, and underserved by infrastructure and other basic services. The CEJST uses publicly-available, nationally-consistent datasets [that] are indicators of burdens that disadvantaged communities face. These burdens are related to climate change, the environment, health, and economic opportunity." (Instructions to Federal Agencies on Using the Climate and Environmental Justice Screening Tool," CEQ, Executive Office of the President of the United States, January 2023, page 2.) A memorandum

affected by hazardous particulate emissions, hydrogen sulfide irruption events, harmful blooms of toxic algae, and other serious problems caused by shrinkage and deterioration of the Salton Sea related to the QSA water transfers.[139] The serious concerns of those communities include, but are not limited to, significant and disproportionate pulmonary illness associated with chronic inhalation of dangerous particulates being emitted from increasingly exposed Salton Sea lakebed. The proximity of disadvantaged populations to the Salton Sea ensures they will be subjected to worsening harm as the lake continues to shrivel and the ecosystem deteriorates further toward complete collapse.[140] Because of the fundamental limitations and problems intrinsic to all in-basin restoration plans, increased morbidity and mortality in communities near the Salton Sea will occur if such a plan is implemented.[141]

VII.B. Ocean water importation options

1. Proposed ocean water importation plans entail refilling the Salton Sea and restoring a robust aquatic ecosystem capable of supporting the number and diversity of species originally reliant on the huge lake. Pursuant to such a plan, millions of birds and hundreds of millions of fish could again be sustained by the Salton Sea. In broad terms, the proposed concepts would accomplish restoration by utilizing either: (a) desalinated seawater from the Gulf of California or Pacific Ocean imported into the Salton Basin; or (b) imported seawater that is not desalinated, in combination with some sort of outflow mechanism to prevent salts from continuing to accumulate in the lake. Various ocean water importation plans of these two general types have been proposed, some of which involve recent technological advancements.

2. An ocean water importation plan would avoid all of the many serious problems afflicting in-basin plans, including all of the important difficulties noted in Part VII.A above. Utilizing ocean water to refill the Salton Sea and reestablish its ecosystem is the only approach that can break the tight linkage between Colorado River water use and sustenance of the Salton Sea, achieve permanent restoration of the lake, and protect both wildlife and people from significant harm. Specifically:

    a. An ocean water importation plan would fully restore essential Salton Sea habitat to conserve hundreds of species that will otherwise face grave threats to their survival. Moreover, restoring the Salton Sea with ocean water would avoid the substantial ongoing risks to both wildlife and people posed by in-basin plans that necessarily rely

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from the Executive Office of the President to the heads of federal executive departments and agencies dated January 27, 2023 stated that federal agencies should immediately start using the CEJST to identify geographically defined disadvantaged communities for purposes of analyzing environmental justice issues. The Climate and Environmental Justice Screening Tool was previously available online at https://screeningtool.geoplatform.gov/en/#8/33.045/-115.98 but was removed by the Trump administration. Subsequently the screening tool was restored online by the Environmental Data and Governance Initiative, and is available at https://public-environmental-data-partners.github.io/j40-cejst-2/en/#3/33.47/-97.5.

[139] See the references cited in footnotes 30, 31, 32, 33, and 34 above

[140] As discussed previously, one significant concern is the fact that inhabited tribal reservation lands of the Torres Martinez Desert Cahuilla Indians adjoin portions of the Salton Sea's exposed lakebed. There are also other Tribes in the Salton Sea region.

[141] For example, in addition to the research highlighted in footnotes 30, 31, 32, 33, and 34, another study concluded: "Between 1998 and 2014, the shrinking Salton Sea was associated with PM2.5 changes that increased lower respiratory mortality outcomes by…1.4/yr.–15.6/yr. in aggregate… [C]hanges in the amount of exposed lake bed around the Salton Sea are responsible for $13.2–$147.3 million per year in lower respiratory mortality costs associated with PM2.5 exposure… [E]ach one-foot drop in lake elevation creates, on average, $151.5 million in respiratory mortality costs in the Salton Sea counties…" (Jones, B.A. and Fleck, J. (2020). Shrinking lakes, air pollution, and human health: Evidence from California's Salton Sea. *Science of the Total Environment* 712(22):136490, http://dx.doi.org/10.1016/j.scitotenv.2019.136490.)

on impoundments constructed of contaminated sediments and filled with polluted wastewater.

b. Use of seawater for full Salton Sea restoration would permanently prevent the emission of dangerous fugitive dust from exposed lakebed. Instead of blowing throughout the surrounding area and chronically jeopardizing human health, the hazardous constituents in lakebed sediments would remain buried.

c. Implementation of a seawater importation plan would facilitate achieving sustainability of the Colorado River system. Such a plan would provide the restored Salton Sea with an enduring source of water independent of the Colorado River that will be immune to the future vagaries of climate change and the impacts of worsening aridification, and will be unaffected by cuts in Colorado River water allocations. If required pursuant to the Post-2026 Program, water rightsholders in the Salton Trough could substantially reduce their use of the Colorado River's water while not causing harm to the Salton Sea, to the lake's wildlife, or to public health.[142]

d. Because inexhaustible ocean water would be used as the restored Salton Sea's water supply, the lake would also be unaffected by other foreseeable circumstances that will substantially reduce future inflows of Colorado River wastewater into the central Salton Basin. For example, the Salton Sea would suffer no adverse impacts as a result of water-use efficiency improvements implemented by Colorado River stakeholders in the Salton Trough, or because of significantly increased recycling and reuse of Colorado River wastewater in the region, or due to entirely consumptive use of large quantities of Colorado River water by anticipated commercial-scale lithium extraction operations in the Salton Basin that will release no wastewater. In contrast, all of those scenarios could fatally undermine an in-basin restoration plan.

e. Using ocean water to accomplish full and permanent Salton Sea restoration would enhance the well-being of communities across the adjacent region, rather than subjecting them to a variety of serious and ongoing health hazards and significant socioeconomic harm.

f. Restoring the Salton Sea with ocean water and reestablishing the lake's ecological, biological, and biogeochemical functions would likely serve to sequester significant amounts of carbon in submerged lakebed sediments, and yield net-zero or net-negative GHG emissions. In contrast, in-basin restoration approaches would likely result in very large quantities of biogenic greenhouse gases being emitted on an ongoing basis, and would impose enormous economic costs related to the damaging climate impacts of those emissions.

VII.C. Interior and Reclamation must take action to ensure that an appropriate, safe, effective, and sustainable restoration plan for the Salton Sea is expeditiously implemented

Implementation of Reclamation's Proposed Action in combination with failure to implement an appropriate, safe, effective, and sustainable long-term restoration plan for the Salton Sea will cause devastating impacts on people, fish and wildlife, the environment, and the climate. Many of the harmful impacts will be irreversible. Failure to implement an appropriate, safe, effective, and sustainable long-term restoration plan for the Salton Sea may occur because: (a) federal and state agencies adopt a no-action or piecemeal minimal-action approach regarding restoration, and no long-term plan for permanent restoration is carried

[142] Also, notably, the various proposed restoration plans involving desalination of seawater from the Gulf of California typically include substantial benefits for Mexico that could help offset the difficulties that country may experience due to future reductions in Colorado River water allocations.

out; or (b) an in-basin long-term plan is selected for implementation but it cannot operate as intended, is otherwise ineffective and/or unsafe, and/or it cannot be sustained over the long term. The problematic scenario (b) may materialize as a consequence of various foreseeable factors—including, but not limited to, the fundamental problem that there is a very high probability the Colorado River water supply necessary for operation of an in-basin plan will not exist in the future, and perhaps even the near future.

Therefore, I suggest it is incumbent on the Secretary of Interior—as Watermaster for the Lower Basin, and the head of the cabinet-level department in charge of, inter alia, management of federal lands and natural resources, stewardship of Tribal lands, and oversight of major agencies involved in and responsible for a panoply of Colorado River and Salton Sea issues—along with the Acting Commissioner of Reclamation, the head of the agency responsible for implementing management of the Colorado River's water, to urge the USACE (as well as the Salton Sea Authority and the California Department of Water Resources, the non-federal sponsors of the ISSS Study), not to move ahead with any long-term plan for Salton Sea restoration that is dependent on large amounts of Colorado River water continuing to flow into the central Salton Basin for decades to come. In doing so, the Secretary and the Acting Commissioner should emphasize that in light of the truly dire water shortage affecting the Colorado River, which is very likely to become even more severe in the coming years, to proceed with any in-basin plan for Salton Sea restoration that is dependent on Colorado River water would be to accept a very high risk that the project will fail because the water necessary to operate it will not exist. The devastating consequences of such a failure will be tantamount to having selected a no-action approach to the Salton Sea crisis, except that billions of dollars will have been wasted on attempting to implement a doomed project. The Secretary and Acting Commissioner should also urge the USACE to fully evaluate the feasibility of all reasonable options and proposals for using ocean water to accomplish permanent Salton Sea restoration. The evaluated options and proposals should include, but should not be limited to, proposals that were originally submitted to the U.C. Santa Cruz panel but were not included in the SSMP's Long-Range Plan because the U.C. Santa Cruz panel failed to evaluate them in a full, scientifically sound feasibility study, even though the panel was contractually required to do so. If the USACE does not have the requisite jurisdiction to properly accomplish this essential feasibility study of options and proposals to use ocean water to fully restore the Salton Sea, or is unable or unwilling to conduct it for other reasons, then Interior and Reclamation should promptly commence the necessary study and expedite it. If Interior and Reclamation do not currently have the legal authorities needed to do so, they should expeditiously obtain those authorities.

VIII. Failure to properly address Salton Sea issues and Salton Sea Impacts in the DEIS is counter-productive and short-sighted, and will adversely affect post-2026 management of the Colorado River

On June 6, 2025, during the Annual Colorado Law Conference on Natural Resources at the University of Colorado in Boulder, Scott Cameron—who was then the Acting Assistant Secretary for Water and Science in the Department of the Interior, but is now the Acting Commissioner of the Bureau of Reclamation—made clear Interior's and Reclamation's intention to omit from the DEIS any analysis of the Salton Sea crisis and Salton Sea Impacts.[143] A member of the audience asked Mr. Cameron, "In the post-2026 plan, how are we going to account for the fact reductions in IID's use of Colorado River water could reduce water in the Salton Sea?"[144] Mr. Cameron responded (emphasis added), "So that's a real, legitimate concern, and I know there's a lot of interest at the state level, and there are federal equities in terms of national wildlife refuges, you know, around the Salton Sea, and associated with IID project, of course. **The short answer is we are not directly taking on the Salton Sea as part of the NEPA process**, at least in terms of what you should expect to see in our Draft EIS alternatives. If the public comment period generates some issues regarding the Salton Sea that we think we

[143] A video recording of Mr. Cameron's statements in Session 5 of the conference is available online at: https://www.youtube.com/watch?v=lAmiWGzy85E&list=PLwFq2GL-i5UiQ1Gih81nnqhH0gR1eXVh7&index=5

[144] Id. at 17:59 to 18:16.

need to address, then we will address them. But, **quite frankly, we've got enough problems worrying about Lake Mead and Lake Powell than to try to figure out how to solve the Salton Sea at the same time.**"[145]

While Mr. Cameron's candor was appreciated, the choice by Reclamation and Interior to avoid considering the Salton Sea crisis and the Salton Sea Impacts of the Proposed Action when making decisions about post-2026 Colorado River management is insupportable under applicable law as explained above. Moreover, failing to address Salton Sea issues and Salton Sea Impacts that are directly related to post-2026 Colorado River management is both counter-productive and short-sighted with regard to the need for such management to sustain the river system and to support more than 40 million people and millions of acres of farmland reliant on the river.

In light of Acting Commissioner Cameron's background in both biology and natural resources economics, the details of the Salton Sea crisis and its consequences for fish, wildlife, the environment, and people must be clear to him. Certainly, he understands that IID cannot reduce Imperial County's use of Colorado River water without substantially worsening the Salton Sea's crisis and exacerbating the resulting harm to fish, wildlife, the environment, and people. The Acting Commissioner surely also understands that, in light of the nature and severity of the Colorado River's own water-scarcity crisis and the projections for worsening water shortages in the future, any proposed restoration plan for the Salton Sea that relies throughout the coming decades on continuing inflow of very large quantities of Colorado River water is unsustainable and untenable.

The use of inexhaustible ocean water to restore the Salton Sea, and to sever the tight linkage between IID's use of Colorado River water and the fate of the Salton Sea and its ecosystem, is the only approach that will actually solve the Salton Sea crisis and permanently avoid, or minimize and fully mitigate, the otherwise dire Salton Sea Impacts of the Proposed Action, *while simultaneously relieving tremendous pressure on the Colorado River system.* For example, if ocean water is used to restore the Salton Sea, IID could reclaim and reuse a substantial portion of the District's Colorado River wastewater for agriculture without causing devasting impacts on the Salton Sea. Such an approach could enable IID to reduce the amount of water the District draws directly from the river while also continuing to sustain the extremely important agricultural industry and associated economy in the Imperial Valley that supplies most of the vegetables consumed in the United States from late fall through spring.[146] But if a restoration plan for the Salton Sea that depends on continued inflow into the central Salton Basin of large quantities of Colorado River wastewater is the approach adopted by federal and state agencies, IID is highly unlikely to proceed with any water conservation measures involving recycling and reuse of a substantial portion of the District's wastewater (and is unlikely to proceed with any other water conservation actions, beyond the measures already undertaken, that substantially reduce the District's wastewater), because of the devastating impacts on the Salton Sea, fish and wildlife, and people throughout the surrounding region that would be the unavoidable consequences of such actions.

The Salton Sea crisis has resulted, inevitably, from construction and use of the 20th-century infrastructure that Reclamation utilizes to control the Colorado River and exhaustively distribute its water, and from implementation of Reclamation's 21st-century river-management decisions. In order to address both the Salton Sea crisis and the Colorado River crisis, it is necessary for Interior and Reclamation to consider carefully the ways in which the issues are intertwined, and to undertake an integrative approach that will actually solve the intractable problems involved. Continuing to resort to the use of Band-aids to postpone undertaking complex analyses and delay making difficult decisions is counter-productive, short-sighted, and unsustainable; and, in the long run, such a Band-aid approach will only serve to worsen the already severe problems affecting both the Salton Sea and the Colorado River.

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[145] Id. at 18:17 to 19:07.

[146] If Interior and Reclamation, and/or Colorado River water rights holders in other locations, were to fund the construction and operation of appropriate wastewater recycling facilities in Imperial County, conceivably IID might seriously consider reclaiming and reusing its wastewater in order to decrease the amount of Colorado River water the District draws directly from the river. However, please note that I do not speak for IID in any way.

IX. Conclusion and Recommendations

In the Post-2026 Program, Interior and Reclamation have a responsibility to manage the Colorado River system in ways that sustainably address the river's water-scarcity crisis. But, in doing so, those agencies must take into account the fact that for too long the Salton Sea ecosystem, the fish and wildlife dependent on it, and communities throughout the region surrounding the lake have improperly been an afterthought, or entirely ignored, in Colorado River management decisions; and they have therefore borne the brunt of many harmful consequences stemming from those decisions. That unjust, disproportionally injurious, and unlawful situation must not continue.

The DEIS does not satisfy applicable legal requirements. The Proposed Action will cumulatively and significantly exacerbate the harm that has already been inflicted on the Salton Sea and its ecosystem, fish and wildlife, the regional environment, the climate, and more than half a million people who live and work in areas adjacent to the lake—including Tribes to whom Interior and Reclamation owe federal Indian trust responsibilities. Yet the DEIS wrongly fails to evaluate the many foreseeable and significant Salton Sea Impacts of the Proposed Action, and also fails to suggest effective mechanisms for avoiding those impacts or for minimizing and fully mitigating the harm that is impossible to avoid. If Reclamation proceeds to implement the Proposed Action as the Post-2026 Program, and an appropriate, safe, effective, and sustainable plan for restoration of the Salton Sea ecosystem is not also implemented, there will be catastrophic and irreversible consequences for fish, wildlife, and people.

For all of the foregoing reasons, I respectfully suggest that Interior and Reclamation should promptly undertake the following essential actions:

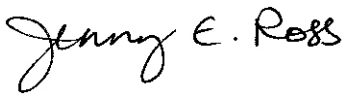
1. Formulate and issue a revised DEIS that:
    a. Includes the improperly omitted analyses of Salton Sea issues and Salton Sea Impacts, and identifies and commits to implementing effective measures to avoid, or minimize and fully mitigate, the harmful impacts of the Proposed Action on fish, wildlife, the regional environment, the climate, and people throughout the Salton Sea area, including but not limited to Tribes.
    b. Includes a detailed evaluation of Reclamation's options and the agency's preferred action alternative for addressing the foreseeable and potentially impending scenario in which one or both major mainstream reservoirs drop to critically low levels, the integrity of Reclamation's infrastructure is in imminent danger, the ability of that infrastructure to move water downstream to the Lower Basin states and Mexico is in jeopardy, and public health and safety are gravely threatened.
2. Immediately contact the USACE and engage in consultation and collaboration regarding options for implementing an appropriate, safe, effective, and sustainable plan for restoration of the Salton Sea ecosystem. Specifically, Interior and Reclamation should urgently discuss the following issues with the USACE:
    a. The water-supply crisis affecting the Colorado River is occurring because climate warming is adversely affecting the Basin's hydrology. The ongoing situation is genuinely dire and potentially catastrophic, and it is anticipated that Colorado River water scarcity will worsen considerably in the coming decades.
    b. If the ISSS Study recommends and proceeds to implement an in-basin project that is reliant on continued inflow of large quantities of Colorado River water, it is very likely that the project will not be sustainable—and foreseeably may fail in the near future—because the necessary water will not be available.
    c. A restoration plan for the Salton Sea and its ecosystem that utilizes ocean water importation instead of Colorado River water would: avert devastatingly harmful consequences for fish,

wildlife, and people that will otherwise occur because of the Proposed Action; potentially relieve substantial pressure on the Colorado River system by enabling Salton Trough water users to recycle and reuse their Colorado River wastewater; and facilitate successful implementation of the Post-2026 Program to protect and sustain the Colorado River and the infrastructure used to manage it, and to safeguard public health and safety.

3. Expeditiously obtain whatever legal authorities are necessary for Interior and Reclamation to proceed with implementation of an appropriate, safe, effective, and sustainable restoration plan for the Salton Sea and its ecosystem that is not reliant on Colorado River water, and that will avoid or minimize and fully mitigate the harmful impacts of the Proposed Action, in the event that the USACE will not be proceeding with such a plan (either because of jurisdictional constraints or for other reasons).

Thank you for considering these comments.

Sincerely,



Jenny E. Ross, J.D.
Research Affiliate, Stout Research Center[147]

cc:

Gavin Newsom, Governor of California
Doug Burgum, Secretary of the U.S. Department of the Interior
Scott J. Cameron, Acting Commissioner of the Bureau of Reclamation
Alex Padilla, U.S. Senator for California
Adam Schiff, U.S. Senator for California
Wade Crowfoot, California Secretary for Natural Resources
Yana Garcia, California Secretary for Environmental Protection
Karla Nemeth, Director of the California Department of Water Resources
Raul Ruiz, M.D., U.S. Congressman for the 25th District of California
Steve Padilla, California State Senator, District 18
Jeff Gonzalez, California Assemblymember, District 36
Andrea Travnicek, Assistant Secretary for Water and Science, U.S. Department of the Interior
Joe Shea, Assistant Secretary for Salton Sea Policy, California Natural Resources Agency
Jeremy J. Brooks, Salton Sea Program Manager, Bureau of Reclamation
Susie Ming, USACE Project Manager, Imperial Streams Salton Sea Feasibility Study
Joaquin Esquivel, Chair of the California State Water Resources Control Board
G. Patrick O'Dowd, Executive Director/General Manager, Salton Sea Authority
Jessica Neuwerth, Executive Director, Colorado River Board of California
J.B. Hamby, Chair, Colorado River Board of California
James Newcomb, SSMP Lead and Assistant Deputy Director, California Dept. of Water Resources

[147] As a Research Affiliate of the Stout Research Center, I study a variety of scientific issues related to the Colorado River system, the Salton Trough, and the past, present, and future of the Salton Sea, including Pliocene-to-Holocene geology, paleontology, hydrology, climatology, and ecology. These comments are submitted in my personal capacity and not on behalf of the Stout Research Center.