

**California Regional Water Quality Control Board
Santa Ana Region**

RESOLUTION NO. R8-2024-0031

Declaration of Conformation with the State Recycled Water Policy

WHEREAS, the California Regional Water Quality Control Board, Santa Ana Region (hereinafter Santa Ana Water Board), finds that:

1. Amendments to the Water Quality Control Plan for the Santa Ana River Basin (Basin Plan) to incorporate a revised Total Dissolved Solids and Nitrogen Management Plan (TDS/N Management Plan) into the 1995 Basin Plan were approved by the Water Board on January 22, 2004, by the State Water Resources Control Board on October 1, 2004, and by the Office of Administrative Law on December 23, 2004.
2. Further amendments to the 2004 Basin Plan to revise the TDS/N Management Plan were approved by the Water Board on December 10, 2021, by the State Water Resources Control Board on May 10, 2022, and by the Office of Administrative Law on July 27, 2023.
3. The TDS/N Management Plan addresses total dissolved solids (TDS) and nitrogen in both surface waters and groundwaters throughout the Santa Ana River basin.
4. The TDS/N Management Plan contains groundwater and surface water monitoring requirements.
5. The TDS/N Management Plan promotes the use of recycled water throughout the region while ensuring protection of beneficial uses.
6. The TDS/N Management Plan was developed through a collaborative effort by the Santa Ana Water Board and numerous wastewater treatment and water supply stakeholders within the Santa Ana River Watershed (referred to as the Nitrogen and TDS Task Force). The Water Board and these stakeholders are now continuing the task force effort (now referred to as the Basin Monitoring Program Task Force) to provide continued coordinated implementation of the TDS/N Management Plan and to update the TDS/N Management Plan, as determined necessary.
7. The State Water Resources Control Board adopted an amended Water Quality Control Policy for Recycled Water on December 11, 2018, which became effective on April 8, 2019 (2019 Recycled Water Policy).
8. The 2019 Recycled Water Policy requires regional water boards to evaluate existing salt and nitrogen management plans by April 8, 2024. In its review of existing salt and nitrogen management plans, regional water boards are required to assess and review monitoring data and update basin evaluations of assimilative capacity, among

other things, and to update or revise existing plans as warranted. Reviews of existing plans are to occur in coordination with stakeholders impacted by the existing plan.

9. The TDS/N Management Plan is an existing plan under the 2019 Recycled Water Policy and thus is subject to review by the Santa Ana Water Board to determine consistency and compliance with the 2019 Recycled Water Policy.
10. In coordination with the Water Board, the Basin Monitoring Program Task Force conducted a review of the TDS/N Management Plan and Task Force implementation actions to assess and review monitoring data, update basin evaluations of assimilative capacity and evaluate compliance with the 2019 Recycled Water Policy.
11. The Basin Monitoring Program Task Force has prepared a *Declaration of Conformance with 2019 Recycled Water Policy* document (Declaration of Conformance) that documents and demonstrates that the TDS/N Management Plan and the ongoing Task Force actions and activities are consistent with and fulfill requirements of the 2019 Recycled Water Policy. The Declaration of Conformance is attached hereto as Attachment A.

THEREFORE, BE IT RESOLVED THAT:

1. The Santa Ana Water Board hereby confirms its agreement with the findings in the Declaration of Conformance.
2. The Santa Ana Water Board hereby finds that the TDS/N Management Plan, water quality monitoring programs and permitting procedures described in the Declaration of Conformance meet all of the specific requirements set forth in the 2019 Recycled Water Policy.
3. The Executive Officer is directed to forward this Resolution and the attached Declaration of Conformance to the State Water Resources Control Board.

I, Jayne Joy, Executive Officer, do hereby certify that the foregoing is a full, true and correct copy of a resolution adopted by the California Regional Water Quality Control Board, Santa Ana Region, on March 15, 2024.

Jayne Joy
Executive Officer

Attachment A to Resolution R8-2024-0031

Declaration of Conformance with 2019 Recycled Water Policy

Background

On February 3, 2009, the State Water Resources Control Board (State Water Board) approved Resolution No. 2009-11, adopting a Policy for Water Quality Control for Recycled Water (2009 Recycled Water Policy). The 2009 Recycled Water Policy required all regional water quality control boards (regional water boards) to develop and adopt salt and nutrient management plans through collaborative stakeholder processes, establish monitoring programs to implement the salt and nutrient management plans, and streamline the permitting process for recycled water use where possible. In response to the mandates in the 2009 Recycled Water Policy, the Santa Ana Regional Water Quality Control Board (Santa Ana Water Board) adopted Resolution No. R8-2010-0012 on March 18, 2010, declaring its agreement with findings contained in the 2010 Declaration of Conformance with the Recycled Water Policy (2010 Declaration) prepared by the Basin Monitoring Program Task Force. The 2010 Declaration was prepared to demonstrate that the Total Dissolved Solids and Nitrogen Management Plan (TDS/N Management Plan) adopted into the Water Quality Control Plan for the Santa Ana River Basin (Basin Plan) in 2004 and subsequent Task Force actions, were consistent with and fulfilled the requirements of the 2009 Recycled Water Policy and the need for a salt and nutrient management plan. Resolution No. R8-2010-0012 and the 2010 Declaration were submitted to the State Water Board on April 10, 2010.

On December 11, 2018, the State Water Board adopted the Water Quality Control Policy for Recycled Water (2019 Recycled Water Policy or Policy), which amended the 2009 Recycled Water Policy. The 2019 Recycled Water Policy became effective on April 8, 2019, after being approved by the Office of Administrative Law (OAL). The purpose of the 2019 Recycled Water Policy is to encourage the safe use of recycled water from wastewater sources in a manner that implements state and federal water quality laws and protects public health and the environment. The Policy also provides direction to regional water boards, proponents of recycled water projects, and the public on appropriate criteria that should be used by the State Water Board and regional water boards when issuing permits for recycled water projects.

In the 2019 Recycled Water Policy, the State Water Board found that recycled water use is safe for approved uses when used in compliance with the Policy, California regulations, and all applicable state and federal water quality laws. The State Water Board supports the use of recycled water as a safe alternative to fresh water or potable water. Recognizing the statewide benefits of recycled water use, the 2019 Recycled Water Policy set new goals for recycled water use. The state-wide goals are: (1) increase the use of recycled water to 2.5 million acre-feet per year (afy) by 2030; (2) reuse all dry weather direct discharges of treated wastewater to enclosed bays, estuaries and coastal lagoons, and ocean waters that can be viably put to a beneficial

use; and (3) maximize the use of recycled water in areas where groundwater supplies are in a state of overdraft, to the extent that other rights and public trust resources are protected.

The 2019 Recycled Water Policy carries forward the key requirement for managing salts and nutrients on watershed or basin basis: “Salts and nutrients from all sources must be managed on a basin-wide or watershed-wide basis in a manner that ensures attainment of water quality objectives and protection of beneficial uses.”¹ Further, the Policy continues to promote the use of regional or subregional salt and nutrient management plans as the most effective method for addressing salt and nutrient loading.² To effectuate this purpose, the 2019 Recycled Water Policy requires regional water boards to identify basins through resolution or executive officer determination where salts and/or nutrients are a threat to water quality and in need of salt and nutrient management planning. For these basins, salt and nutrient management plans (or a functionally equivalent plan) are required to address the water quality concerns of the basin and subbasin.³

Where salt and nutrient management plans were adopted through a Basin Plan amendment or accepted by a regional water board prior to April 8, 2019, the 2019 Recycled Water Policy requires regional water boards to evaluate existing plans by April 8, 2024.⁴ Regional water board evaluations of existing plans must, in consultation with stakeholders, consist of the following: (1) assess and review monitoring data generated from existing plans, (2) using the results of the data assessment, update basin evaluations of available assimilative capacity, projected trends, and concentrations of salts and nutrients in groundwater, and (3) determine if updates or revisions to the existing plan are warranted as a result of the data assessment.⁵

This Declaration of Conformance is intended to demonstrate that the existing (as of December 2023) TDS/N Management Plan for the Santa Ana Region, and the ongoing Basin Monitoring Task Force actions, collectively fulfill the requirements of the 2019 Recycled Water Policy.

Salt and Nutrient Management Plan

The 2019 Recycled Water Policy requires salt and nutrient management plans to include the following components: 1) a basin or subbasin wide monitoring plan; 2) water recycling use goals and objectives; 3) salt and nutrient source identification, basin or subbasin assimilative capacity and loading estimates along with fate and transport of salts and nutrients; 4) implementation measures to manage or reduce salt and nutrient loading in the basin on a sustainable basis; and 5) an antidegradation analysis that

¹ 2019 Recycled Water Policy, p. 7, § 6.1.2.

² *Ibid.*

³ 2019 Recycled Water Policy, p. 8, § 6.1.3.

⁴ 2019 Recycled Water Policy, p. 8, § 6.2.1.3.

⁵ 2019 Recycled Water Policy, p. 11. §§ 6.2.6-6.2.7.

satisfies State Water Board Resolution 68-16, Statement of Policy with Respect to Maintaining High Quality Waters in California (Resolution 68-16).⁶ As described here, the existing TDS/N Management Plan specified in the Basin Plan and the amendments as of 2023 combined with Basin Monitoring Task Force actions meets the requirements set forth in the 2019 Recycled Water Policy and is functionally equivalent to a salt and nutrient management plan.

A. The TDS/N Management Plan

In January of 2004, the Santa Ana Water Board approved Resolution No. R8-2004-0001, adopting a Basin Plan amendment to incorporate a salt and nutrient management plan for the Santa Ana River watershed, otherwise referred to as the TDS/N Management Plan. The TDS/N Management Plan relied on the best available scientific information to identify discrete groundwater management zones (i.e., basins or subbasins) and establish appropriate water quality objectives for total dissolved solids (TDS) and nitrate-nitrogen for each management zone. The 2004 TDS/N Management Plan took into consideration a wide variety of basin-specific factors including the size and complexity of each groundwater management zone, source water quality, stormwater recharge, hydrogeology, and water quality. In addition, the Santa Ana Water Board established implementation measures to manage salt and nutrient loading in each basin and performed a comprehensive antidegradation analysis that demonstrated conformance with Resolution No. 68-16.

The 2004 TDS/N Management Plan was developed through an intensive, multi-year collaborative effort that began in 1994 and resulted in the 2004 Basin Plan amendment. To implement the 2004 TDS/N Management Plan, local water and wastewater agencies formed the Basin Monitoring Program Task Force (Task Force), which is administered by the Santa Ana Watershed Project Authority (SAWPA). Since 2004, the Task Force has continued to work collaboratively to implement the TDS/N Management Plan, among other activities. Per the 2004 Basin Plan amendment, the Task Force has prepared updated ambient water quality (AWQ) recomputations and assimilative capacity findings for groundwater management zones every three years. The updated AWQ recomputations and assimilative capacity findings have been approved or accepted by the Santa Ana Water Board via resolutions, which are posted on the Santa Ana Water Board's website and used by the Santa Ana Water Board for permitting and regulatory purposes.

In 2021, the Task Force worked collaboratively to update the 2004 TDS/N Management Plan and put forward a Basin Plan amendment, in part, to address the 2019 Recycled Water Policy. The Basin Plan amendment was adopted by the Santa Ana Water Board on December 10, 2021 (Resolution R8-2021-0025), and subsequently approved by the State Water Board and OAL on May 10, 2022, and July 27, 2023, respectively (2021 Basin Plan Amendment). The updates did not substantially change the TDS/N Management Plan except with respect to updates to wasteload allocations (WLAs) for

⁶ 2019 Recycled Water Policy, pp. 10-11, § 6.2.4.

TDS and Total Inorganic Nitrogen (TIN), which apply to publicly owned treatment works (POTWs) that discharge treated wastewater to the Santa Ana River and its tributaries. The 2021 Basin Plan amendment also required updates to both the surface and groundwater monitoring programs, in part to ensure compliance with the 2019 Recycled Water Policy.

Concurrent with the development of this Declaration of Conformance, the Task Force has taken actions to ensure compliance with the 2019 Recycled Water Policy. These concurrent actions include: 1) updates to the TDS and nitrogen surface and groundwater monitoring programs, 2) identification of potential data gaps for both monitoring programs, include defining actions to address actual data gaps, 3) development of a methodology/process to re-evaluate groundwater aquifer storage properties, where necessary, to support assimilative capacity assessments, 4) review of the methods to assess assimilative capacity in each GMZ every five years, and 5) development of additional Basin Plan amendments to update the TDS/N Management Plan for Santa Ana Water Board consideration.

Reference to the TDS/N Management Plan in this Declaration of Conformance is inclusive of the original TDS/N Management Plan specified in the 2004 Basin Plan amendment, subsequent Basin Plan amendments including the 2021 Basin Plan amendment, relevant reports and studies issued to implement the TDS/N Management Plan, and actions being taken concurrently with approval of the Declaration of Conformance. Thus, evaluation of the TDS/N Management Plan for compliance with the 2019 Recycled Water Policy includes all of these actions and not just the original 2004 TDS/N Management Plan.

B. TDS/N Management Plan satisfies and complies with the 2019 Recycled Water Policy.

Putting aside the monitoring plan requirements, which are discussed in subsection C below, the detailed and long-standing TDS/N Management Plan for the Santa Ana Region is consistent with the 2019 Recycled Water Policy as described here.

The TDS/N Management Plan in its entirety is designed to encourage reclamation of wastewater while also ensuring that beneficial uses are protected in the region's groundwater basins.⁷ The predominant types of recycled water use that occur in the Santa Ana Region include irrigation of agricultural land and urban/commercial landscaping, discharges to the Santa Ana River, and groundwater recharge through percolation or injection. The single largest reclamation activity is discharge of treated wastewater to Reaches 3, 4, and 5 of the Santa Ana River and their tributaries: "These discharges make up as much as 95 percent of the river's dry weather flow and enhance the in-stream beneficial uses of the river throughout its 26-mile length (San Bernardino to Prado Dam)."⁸ Considering these predominant recycled water uses, the Santa Ana

⁷ Basin Plan, Chapter 5, Updated September 2020 to include approved amendments, p. 5-30.

⁸ Basin Plan, Chapter 5, Updated September 2020 to include approved amendments, p. 5-32.

Water Board protects beneficial uses by regulating all recycled water projects pursuant to a process that considers available assimilative capacity as compared to adopted water quality objectives and in accordance with maximum benefit implementation strategies. The process for regulating recycled water projects has been streamlined and includes significant efficiencies in order to encourage the use of treated wastewater. Because of these efforts, little if any reclaimed wastewater is discharged to the Pacific Ocean. This streamlined permitting approach is also the Santa Ana Water Board's primary implementation measure for managing salt and nutrient loading to the basins. The TDS/N Management Plan's permitting process for recycled water projects was described in detail as part of the 2010 Declaration, and is still applicable today, with some slight modifications.

A key component of the TDS/N Management Plan is the Basin Plan's inclusion of TDS and nitrate-nitrogen water quality objectives for groundwater management zones and TDS and TIN surface water quality objectives for the Santa Ana River and its tributaries.⁹ For the most part, the groundwater objectives for each management zone are based on a statistical representation of historical concentrations of TDS and nitrate-nitrogen for the 20-year period of 1954 through 1973. These objectives are commonly referred to as the "antidegradation" objectives because they represent ambient water quality conditions and this time-period encompasses ambient water quality in 1968, which is when the antidegradation policy was adopted.¹⁰ Notably, if the calculated nitrate-nitrogen concentration for the objective setting period exceeded 10 mg/L for nitrate-nitrogen, the water quality objective was set at 10 mg/L to be consistent with the primary drinking water standard. The Basin Plan also includes alternative "Maximum Benefit" water quality objectives for some groundwater management zones and surface waters, which allow for some degradation of water quality where assimilative capacity is available as long as the agency proposing the maximum benefit water quality objective can demonstrate that beneficial uses will be protected and that water quality consistent with maximum benefit to the people of the state will be maintained.¹¹ The updated antidegradation objectives were adopted into the Basin Plan in 2004 along with adoption of the original TDS/N Management Plan. Maximum benefit objectives, and their associated commitments, have been adopted periodically for different groundwater management zones as put forward by various agencies.

As part of the process of preparing the 2004 Basin Plan amendment, the TDS/Nitrogen Task Force (which subsequently became the Basin Monitoring Program Task Force) clearly defined the assimilative capacity and made updated assimilative capacity findings for the Santa Ana Region's groundwater management zones based on the antidegradation and maximum benefit objectives and has since updated these findings of ambient water quality and assimilative capacity every three years. Consistent with the 2019 Recycled Water Policy, beginning from 2023, the Task Force will perform the technical work to update the assimilative capacity and ambient water quality findings at

⁹ Basin Plan, Chapter 4, Updated June 2019 to include approved amendments, pp. 4-26 – 4-30.

¹⁰ Basin Plan, Chapter 4, Updated June 2019 to include approved amendments, pp. 4-26.

¹¹ Basin Plan, Chapter 4, Updated June 2019 to include approved amendments, pp. 4-29-4-30.

least once every five years.¹² The Santa Ana Water Board relies on these findings to evaluate compliance with water quality objectives, revise WLAs, and for other regulatory purposes, as determined appropriate.

Discharges of TDS and TIN to the Santa Ana River that recharge groundwater management zones are regulated through WLAs, which are developed through the use of a wasteload allocation model (WLAM) to determine if the permitted waste loads will enable compliance with surface water and groundwater quality objectives. In short, WLAs distribute a share of total TDS and TIN loads to each of the POTWs that discharge treated wastewater to the Santa Ana River and its tributaries.

The WLAs are updated periodically to reflect the best available science and data. The most recent update began in 2017, was completed in 2020, and was adopted by the Santa Ana Water Board with the 2021 Basin Plan amendment. The 2021 Basin Plan amendment describes the updated WLAM as compared to the WLAM that was described in the 2004 Basin Plan Amendment. The WLAM is significant because it is used by the Santa Ana Water Board to derive appropriate TDS and TIN discharge limitations for recycled water discharges to the Santa Ana River system, while taking into account the nitrate-nitrogen reductions that occur naturally through system mixing, or as a result of geochemical transformation during percolation through the streambed segments. Using the updated 2020 WLAM, the 2021 Basin Plan amendment also updated the WLAs for TDS and TIN to be incorporated into waste discharge requirements for wastewater treatment facilities (POTWs) that discharge to the Santa Ana River and its tributaries.

The updated WLAs are expressed in Basin Plan Table 5-5. The 2021 Basin Plan amendment did not result in substantial changes to the previous WLAs. None of the existing facilities in Basin Plan Table 5-5 received less stringent effluent limits for TIN or TDS due to the WLAs update. Additional wastewater treatment facilities were added to Basin Plan Table 5-5 with the 2021 Basin Plan amendment, including: City of San Bernardino Geothermal Facility, which discharges to Santa Ana River Reach 5 via East Twin Creek and Warm Creek (overlying the Bunker Hill A & B groundwater management zones); and Western Municipal Water District Arlington Desalter 6, which discharges treated effluent to Reach 1a Temescal Creek (within Prado Basin Management Zone). The Corona WWTP-3 wastewater treatment facility was removed because it is no longer in operation.

The next update to the WLAs must be submitted to the Santa Ana Water Board no later than July 27, 2033.

The 2021 Basin Plan amendment also provided updated requirements regarding how permittees must assess compliance with TDS/TIN effluent limitations incorporated into the waste discharge requirements. Specifically:

- TIN - Compliance with the effluent limit will be based on a 12-month volume-weighted running average that is updated every month.

¹² 2019 Recycled Water Policy, § 6.2.6, p. 11.

- TDS – Compliance with the effluent limit will be based on a 60-month volume-weighted running average that is updated every month.

Compliance is stated on a “monthly” basis rather than “yearly” basis because each month the effluent limitation for TIN and TDS is recalculated based on the previous 12 or 60 months, respectively. These TIN and TDS running-average concentrations are used as the default approach for evaluating compliance with effluent limitations included in waste discharge requirements. However, the 2021 Basin Plan amendment also states that the Santa Ana Water Board retains discretionary authority to impose longer or shorter averaging periods, on a case-by-case basis, when it determines that doing so is necessary and appropriate to protect water quality.

The 2021 Basin Plan amendment codifies the Santa Ana Water Board’s longstanding policy that the antidegradation reviews required during development of waste discharge requirements should focus on an analysis of TDS rather than the individual salt ions that comprise TDS.

In addition, and as part of the 2010 Declaration, the Santa Ana Water Board clarified regulatory requirements for new recycled water recharge projects. The approach described therein is still applicable today and is incorporated by reference into this Declaration of Conformance. For ease, the three flowcharts attached to the 2010 Declaration are attached here as Appendices 1 through 3. Also attached are Tables A and B, which identify salinity and nitrate concentrations that are required to protect designated beneficial uses. The flow charts and tables are intended to guide dischargers and Santa Ana Water Board staff with respect to permitting for newly proposed recycled water recharge projects.

In summary, and as described in the 2010 Declaration, where there is assimilative capacity in a given groundwater management zone, it is possible to discharge/recharge nitrate and/or TDS concentrations greater than the objective for that groundwater management zone provided that the WLA is revised to account for new loads. Water quality monitoring data and trend projections, described in subsection C, are used to assess the prudence of permitting such discharges and recharge projects. The thresholds in Tables A and B provide a strong indication as to how the Santa Ana Water Board will perform such evaluations. This approach establishes incentives to implement projects that improve or maintain existing assimilative capacity, and protects the investment of those who do so, by ensuring that the resulting assimilative capacity will not be reallocated to an unrelated agency or project.

Where there is no assimilative capacity available in a given groundwater management zone, the TDS/N Management Plan describes the conditions (i.e., maximum benefit demonstrations) under which the Santa Ana Water Board will consider for increasing the water quality objective (i.e., above the antidegradation objective) in that groundwater management zone to accommodate new recycled water projects. The project sponsor must demonstrate that the provisions of Resolution No. 68-16 are satisfied; specifically, that beneficial uses will continue to be protected (usually by referencing the expected

effects in relation to the threshold values in Table A and B for nitrate and TDS, respectively), and that the resulting water quality will be consistent with the “maximum benefit to the people of California.” Because it is a revision of a water quality objective, the Santa Ana Water Board must also consider the statutory factors listed in Water Code section 13241 before adoption.

There are many ways to demonstrate that a project provides “maximum benefit.” One way is to show that the project increases the use of reclaimed water. When a project proponent makes such a claim, the Santa Ana Water Board will expect the project proponent to show that the project is likely to increase the total cumulative number of uses of recycled water in the region before it is discharged to the ocean. Where a project merely changes the location where reclamation occurs, without increasing the overall volume of reclamation occurring in the watershed, the Santa Ana Water Board will expect to the project proponent to provide additional justification, including an antidegradation analysis, for revising water quality objectives to lower water quality.¹³ Shifting the location at which water recycling occurs is generally permissible provided that the proposed project continues to comply with the approved WLA at the new recharge location. Under such circumstances, there is no need to revise water quality objectives and, therefore, no need to make a maximum benefit demonstration in order to issue a permit for the recycled water project.

In cases where there is no assimilative capacity in a given groundwater management zone and no realistic possibility of revising relevant groundwater objectives, the TDS/N Management Plan permitting approach allows for the use of offset mitigation to assure compliance with the Basin Plan. Whether a project proponent develops offset credits themselves or purchases them from another agency, the Santa Ana Water Board must first approve the use of such mitigation strategies within the project permit. In general, offsets should occur in the same groundwater basin where water quality is most directly degraded by the proposed water recycling project. Further, offsets should be implemented in a manner that maintains overall water quality within the receiving groundwater basin and ensures that there are net zero impacts to water quality due to the project. In other words, the planned offset must ensure that the net concentration of pollutants is not increased as a result of the project. The Santa Ana Water Board may consider authorizing an exception where the resulting groundwater quality will continue to fully protect beneficial uses throughout the life of the project and off-site mitigation serves to restore or enhance beneficial use protection in a separate groundwater basin not currently meeting water quality standards.

The TDS/N Management Plan, and the permitting approaches contained therein, satisfies the 2019 Recycled Water Policy because it sets forth water recycling use goals and objectives by encouraging new recycled water projects while managing salt and nitrate loading in the groundwater management zones. Further, by establishing a

¹³ Notably, if the change in location impacts the location and/or volume of treated wastewater that is otherwise discharged to a surface water, the project sponsor will also need to obtain authorization from the State Water Board’s Division of Water Rights through its change petition process.

streamlined permitted approach, as described above, the Santa Ana Water Board is encouraging new recycled water projects throughout the region.

Next, the TDS/N Management Plan's long-standing approach to setting WLAs and evaluating and computing assimilative capacity on a periodic basis satisfies the 2019 Recycled Water Policy's requirements to include components for identifying sources of salt and nitrate, estimating basin assimilative capacity and loading, and the fate and transport of salt and nutrients in the groundwater management zones.¹⁴ These components, combined with the permitting approach summarized above, also satisfy the need for implementation measures to manage and reduce salt and nutrient loading in the basin on a sustainable basis.¹⁵

The whole of the TDS/N Management Plan results in the management of salt and nitrate discharges in a manner that ensures compliance with antidegradation objectives, or where applicable, maximum benefit objectives. In short, these implementation measures include, but are not limited to, (1) periodic updates to the WLAM; (2) application of WLAs based on the updated WLAM; (3) implementation of maximum benefit projects; (4) annual surface water monitoring for TDS and TIN in the Santa Ana River; and (5) recomputation of ambient water quality and assimilative capacity for the groundwater management zones on a periodic basis. Moreover, the TDS/N Management Plan describes other projects and programs designed to address salt problems in groundwater throughout the Santa Ana Region, which includes brine lines, regional groundwater desalters, stormwater and imported water recharge, and sea water intrusion barriers.¹⁶ The Task Force maintains a summary table of management actions that are being implemented in each of the 35 groundwater management zones in the Santa Ana River Watershed as a result of this assessment and permitting approach.

Finally, the TDS/N Management Plan and the Santa Ana Water Board's permitting approach ensure compliance with Resolution No. 68-16 because ultimately they require that ambient groundwater meet the antidegradation objectives (in other words protects high quality waters) unless the Santa Ana Water Board adopts an alternative objective that is to the maximum benefit to the people of the State, which must be set at a level no higher than necessary to protect beneficial uses.

- C. The TDS/N Management Plan satisfies and complies with the 2019 Recycled Water Policy's requirement for a basin- or subbasin-wide monitoring plan.

In addition to the other elements discussed in subsection B above, the 2019 Recycled Water Policy requires salt and nutrient management plans to incorporate a basin- or subbasin-wide monitoring plan that includes "an appropriate network of monitoring

¹⁴ 2019 Recycled Water Policy, p. 10, § 6.2.4.3.

¹⁵ 2019 Recycled Water Policy, p. 10, § 6.2.4.4.

¹⁶ Basin Plan, Chapter 5, Updated September 2020 to include approved amendments, pp. 5-34 -5-38.

locations to provide a reasonable, cost effective means of determining whether the concentration of salts, nutrients, and ... are consistent with applicable water quality objectives.”¹⁷ According to the 2019 Recycled Water Policy, the monitoring plan (1) must be designed to effectively evaluate water quality in the basin, (2) may include water quality data from existing wells were the wells are located and screened appropriately, and (3) shall identify stakeholders responsible for conducting, compiling and reporting the monitoring data.¹⁸ Moreover, “[t]he frequency of monitoring shall be proposed in the salt and nutrient management plan for review by the regional water board pursuant to 6.2.3.”¹⁹

The TDS/N Management Plan meets or exceeds this requirement through its two monitoring programs for TDS and nitrogen, one for surface water and one for groundwater. The monitoring program requirements are contained in the Basin Plan at Section V of the TDS/N Management Plan, which was most recently updated with the 2021 Basin Plan amendment.²⁰ Following the 2021 Basin Plan amendment, the Task Force undertook an evaluation and data assessment of its monitoring programs to assist the Santa Ana Water Board in meeting its obligation under the 2019 Recycled Water Policy to evaluate the existing TDS/N Management Plan by April 8, 2024. For surface water, the Task Force submitted a 2022 Santa Ana River TDS and TIN Monitoring Work Plan to the Santa Ana Water Board on March 30, 2023. For groundwater, the Task Force submitted a 2022 Groundwater Monitoring Program to Support Implementation of the Santa Ana Basin Plan on March 30, 2023.

The surface water monitoring program focuses on monitoring the Santa Ana River to determine compliance with TIN and TDS objectives annually that apply to the Santa Ana River and to continually measure the effectiveness of the WLAs. The surface water monitoring program also provides useful data and information to evaluate the impact that surface water discharges may have on affected groundwater management zones that are recharged by discharge of treated wastewater to the Santa Ana River. The surface water monitoring annual report must be submitted by August 1 of each year, and it is prepared by SAWPA on behalf of the Task Force and its Members.

For groundwater, current ambient groundwater quality must be reported to the Santa Ana Water Board at a minimum of every five years (starting after October 1, 2023).²¹

To support the Santa Ana Water Board’s evaluation of the groundwater monitoring program for compliance with the 2019 Recycled Water Policy, and to support this Declaration of Conformance, the Task Force engaged West Yost Associates to conduct a stakeholder engaged process to ensure compliance with section 6.2.6 of the 2019

¹⁷ 2019 Recycled Water Policy, p. 10, § 6.2.4.1.

¹⁸ 2019 Recycled Water Policy, p. 10, §§ 6.2.4.1.1, 6.2.4.1.2, and 6.2.4.1.3.

¹⁹ 2019 Recycled Water Policy, p. 10, § 6.2.4.1.

²⁰ Attachment B to Resolution R8-2021-0025, as revised on July 27, 2023, to include minor, non-substantive changes, pp. 21-25.

²¹ Attachment B to Resolution R8-2021-0025, as revised on July 27, 2023, to include minor, non-substantive changes, p. 24.

Recycled Water Policy. This process and data assessment is documented in the 2021 Ambient Water Quality Pilot Study, which was submitted to the Santa Ana Water Board on September 29, 2023. Included in the 2021 Ambient Water Quality Pilot Study is a description of the data collection process, TDS and nitrate statistics and trends that support re-computation of ambient water quality and/or assimilative capacity assessments, the results of ambient water quality re-computation and/or assimilative capacity assessments for a subset of groundwater management zones, a pilot approach for updating aquifer storage properties, a description of the approach that will be taken for the next Ambient Water Quality and Assimilative Capacity Assessment for the period through 2026 that is due to the Santa Ana Water Board by October 1, 2028, and an implementation plan for fiscal years 2023/2024 through 2028/2029.

Further, along with the 2021 Ambient Water Quality Pilot Study report, the Task Force engaged West Yost Associates to work with stakeholders throughout the Region to identify potential data gaps, which is a required element of the data assessment triggered by the 2019 Recycled Water Policy.²² The results of the data gap assessment, which includes a framework for agencies to resolve potential data gaps, are documented in the Data Gap Technical Memorandum, that was submitted to the Santa Ana Water Board on October 31, 2023.

This collective body of work, and the process undertaken to prepare these reports and memorandum, satisfy the data assessment requirements outlined in section 6.2.6 of the 2019 Recycled Water Policy.

Summary

The Santa Ana Water Board adopted a salt and nutrient management plan into the Basin Plan prior to April 8, 2019. In accordance with the 2019 Recycled Water Policy, the Santa Ana Water Board engaged in a stakeholder process to conduct a data assessment and evaluate the existing TDS/N Management Plan to determine if potential updates or revisions to the TDS/N Management Plan are needed to make the plan consistent with the 2019 Recycled Water Policy.

As documented in this Declaration of Conformance, the current TDS/N Management Plan (which includes the original 2004 TDS/N Management Plan and associated Basin Plan amendments, Basin Plan amendments subsequent to 2004 including the 2021 Basin Plan amendment, relevant reports and studies issued to implement the TDS/N Management Plan, and actions being taken concurrently with approval of the Declaration of Conformance) meets the requirements of the 2019 Recycled Water Policy.

²² 2019 Recycled Water Policy, p. 11, § 6.2.6.

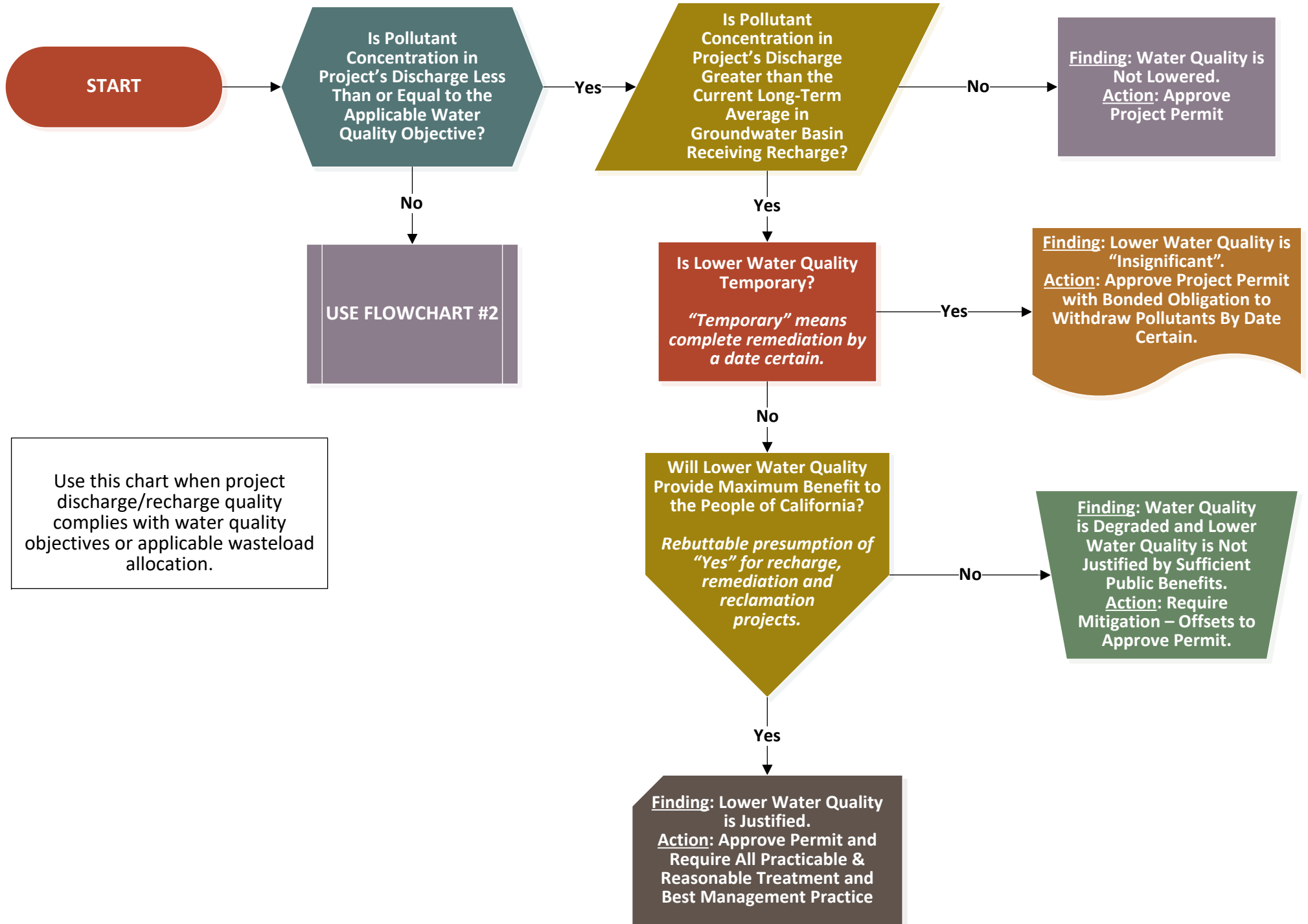
TABLE A: NITRATE-NITROGEN OBJECTIVES AND BENEFICIAL USE PROTECTION

	Use Protection	Burden of Proof	Approvable Outcome
≤5 mg/L	MUN use fully protected; preferred by water agencies for managing drinking water supplies because it provides maximum resource flexibility with minimal need for blending.	Rebuttable presumption of MUN protection; substantial evidence required to sustain argument that beneficial uses are impaired by recycled water provided that the cumulative effect of all recharge projects does not increase groundwater concentrations above 5 mg/L.	Existing NN OBJECTIVES <5 mg/L can be raised to a concentration less than or equal to 5 mg/L to encourage greater use of recycled water provided that beneficial uses remain fully protected in all downgradient management zones.
>5-8 mg/L	MUN use protected but operational flexibility and public confidence in water supplies diminishes as NN concentration increases.	Burden-of-proof is on proponents of recycling projects throughout the review process to demonstrate beneficial uses remain fully protected in all affected receiving waters, including those downgradient from the point of discharge/recharge. Project proponents must demonstrate compelling state interest. The burden-of-proof is proportionate to the change in water quality; increasing as the resulting nitrate-nitrogen concentration changes from 5 mg/L to 8 mg/L.	Established groundwater objectives are not likely to be revised above 5 mg/L unless there is a compelling state interest (such as drought-induced water shortages or significant reduction in State Project Water supplies) to justify lowering water quality.
>8-10 mg/L	MUN use protected but public confidence and flexibility in managing water supplies significantly diminished in this range. Very limited operational safety factor to prevent exceedance of USEPA/CDHS drinking water standards.	Burden-of-proof is on proponents of recycling projects throughout the review process to demonstrate beneficial uses remain fully protected in all affected receiving waters, including those downgradient from the point of discharge/recharge. Project proponents must demonstrate compelling state interest. High level of proof required.	Established objectives in this range for groundwater management zones are based on historic water quality. The increment between 8 mg/L and 10 mg/L provides a safety factor to minimize the possibility that the EPA/CDHS criteria will be exceeded, even temporarily, thereby triggering significant reporting requirements and undermining public confidence in water supplies. Therefore, objectives are not likely to be raised above 8 mg/L in order to maintain this safety factor.
>10 mg/L	MUN use impaired	Non-rebuttable presumption that the MUN use is when NN concentrations are greater than 10 mg/L.	Regional Board cannot approve NN objectives greater than 10 mg/L for groundwaters designated MUN.

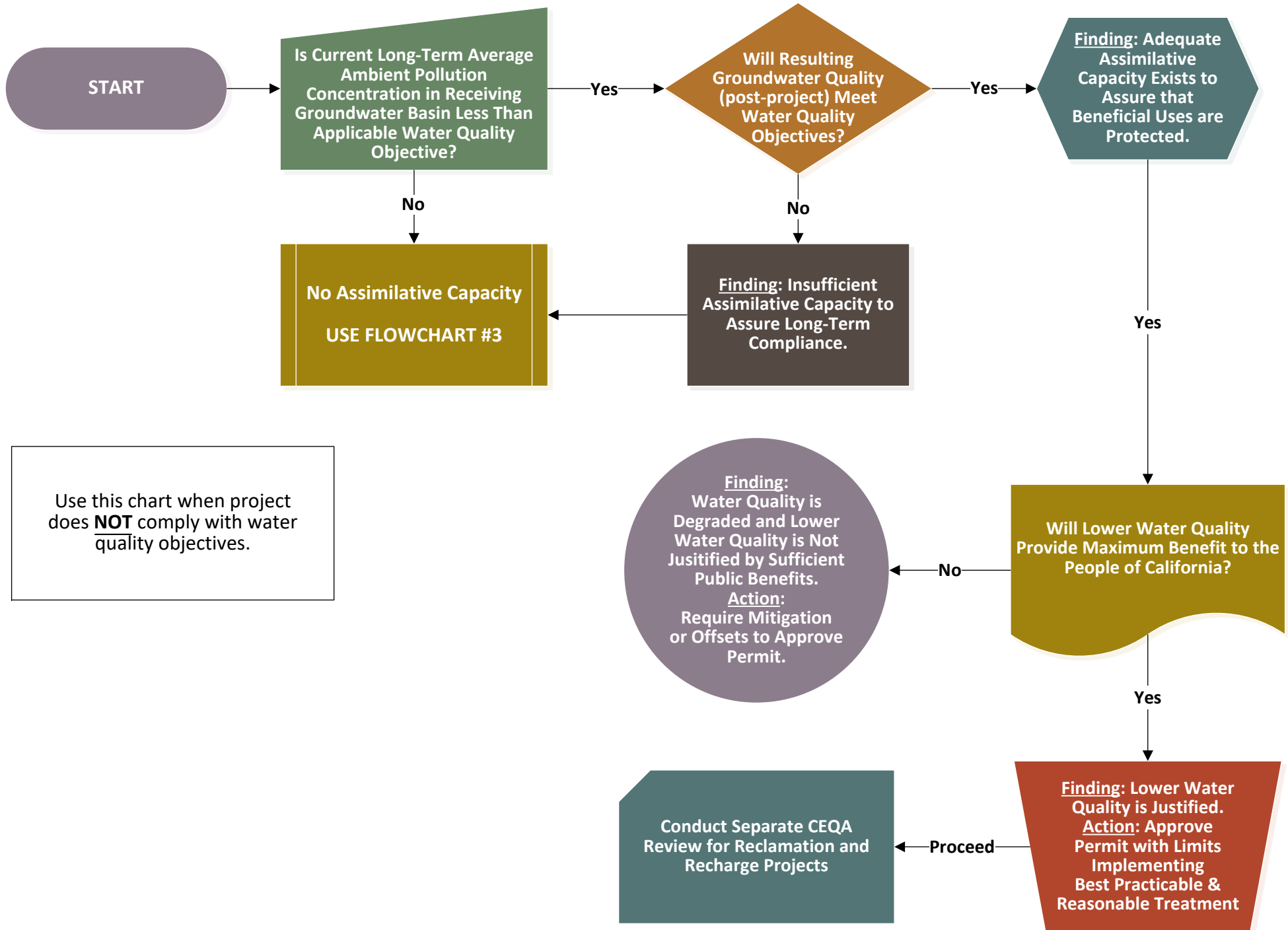
TABLE B: TOTAL DISSOLVED SOLIDS OBJECTIVES AND BENEFICIAL USE PROTECTION

	Use Protection	Burden of Proof	Approvable Outcome
≤500 mg/L	MUN use fully protected. Preferable for drinking water supply. Recommended EPA/DHS Criterion	Rebuttable presumption of MUN protection; substantial evidence required to sustain argument that recycled water impairs beneficial uses provided that the cumulative effect of all recharge projects does not raise groundwater concentrations above 500 mg/L.	Most established TDS objectives for groundwater management zones ≤ 500 mg/L, including maximum benefit objectives set to support water resource management (including recycled water). Established groundwater objectives not likely to be revised above 500 mg/L unless there is a compelling state interest (such as drought-induced water shortages or significant reduction in State Project Water supplies) to justify lowering water quality. Requirements for mitigation rather than revision of objectives likely.
>500-750 mg/L	MUN use protected, but water quality less acceptable to consumers due to taste and odor. TDS at 750 mg/L is last practical use – highest concentration that allows for an additional increment of use (250 mg/L) before exceeding CDHS long-term maximum of 1,000 mg/L.	Burden-of-proof is on proponents of recycling projects throughout the review process to demonstrate beneficial uses remain fully protected in all affected receiving waters, including those downgradient from the point of discharge/recharge. Project proponents must demonstrate compelling state interest and that compliance with mitigation requirements would not be reasonably feasible. The burden-of-proof is proportionate to the change in water quality; increasing as the resulting TDS concentration changes from 500 mg/L to 750 mg/L.	Established objectives in this range for groundwater management zones are based on historic water quality. Further degradation strongly discouraged. Increases to established objectives unlikely. Mitigation requirements in lieu of revision of established objectives highly likely.
>750-1,000 mg/L	Beneficial uses presumed to be unreasonably affected at concentrations greater than 750 mg/L. Some crops (ex.: avocados) are adversely affected at TDS concentrations greater than 750 mg/L. Concentrations ≤ 1,000 mg/L meet CDHS long-term maximum for MUN use, but water quality becomes less acceptable to consumers due to taste and odor. TDS greater than 750 mg/L does not allow for additional use increment (250 mg/L) before exceeding CDHS long-term maximum (1,000 mg/L).	N/A	Regional Board will not approve petitions to increase established objectives to any value greater than 750 mg/L. Mitigation of TDS discharges in lieu of revision of established objectives will be required.
>1,000-1,500 mg/L	DHS temporary maximum is 1,500 mg/L. Supplies in 1,000-1,500 mg/L range are acceptable only for short-term use where there are no practical alternatives for higher quality sources of supply.	N/A	Insufficient data were available to establish TDS objectives for certain management zones as part of the N/TDS Basin Plan amendments. Objectives for these management zones will be set based on quality conditions when and if sufficient data are available. Objectives higher than 1,000 mg/L, if appropriate, would only be approved when such high concentrations represent the best water quality attained since 1968.
3,000 mg/L	Groundwater management zones less than 3,000 mg/L TDS must be designated MUN per Sources of Drinking Water Policy; no practical use without treatment/significant blending that may constitute unreasonable use of water, in violation of California Constitution.	N/A	Insufficient data were available to establish TDS objectives for certain management zones as part of the N/TDS Basin Plan amendments. Objectives for these management zones will be set based on quality conditions when and if sufficient data are available. Objectives higher than 1,500 mg/L will not be approved by the Regional Board.

FLOWCHART #1: ANTIDEGRADATION REVIEW FOR WATER RECHARGE & WASTEWATER RECLAMATION PERMITTING



FLOWCHART #2: ANTIDEGRADATION REVIEW FOR WATER RECHARGE & WASTEWATER RECLAMATION PERMITTING



FLOWCHART #3: ANTIDEGRADATION REVIEW FOR WATER RECHARGE & WASTEWATER RECLAMATION PERMITTING

