Recycled Water Policy Amendment
Response to Comments by Letter
Comment Deadline: 12:00 Noon on June 26, 2018

November 20, 2018

Letter No.	Organization / Group	Page Number
1	**BACWA Bay Area Clean Water Agencies** Commenter: David Williams	5
2	**California Coastkeeper Alliance** Commenter: Sean Bothwell	29
3	**Department of Fish and Wildlife** Commenter: Richard Macedo	82
4	**California Farm Bureau Federation** Commenter: Justin Fredrickson	89
5	**Calleguas Creek Watershed Management Plan** Commenter: Lucie McGovern	96
6	**Carollo Engineers** Commenter: Andrew Salveson	114
7	**Central Valley Clean Water Association** Commenter: Debbie Webster	116
8	**City of Los Angeles Bureau of Sanitation** Commenter: Enrique Zaldivar	124
9	**City of Petaluma** Commenter: Dan St. John	141
10	**The City of San Diego** Commenter: Hooman Partow	146
11	**City of Santa Rosa Water** Commenter: Bennett Horenstein	157
12	**Community Water Center** Commenter: Deborah Ores	162
13	**Coachella Valley Water District** Commenter: Steve Bigley	177

Recycled Water Policy Amendment
Response to Comments by Letter
Comment Deadline: 12:00 Noon on June 26, 2018

November 30, 2018

Letter No.	Organization / Group	Page Number
14	**Coalition of Accredited Laboratories** Commenter: David Kimbrough	186
15	**El Dorado Irrigation District** Commenter: Elizabeth Wells	199
16	**Friends of the North Fork** Commenter: Michael Garabedian	201
17	**General Public** Anthony Serrano	211
18	**General Public** Anthony Serrano	215
19	**General Public** Anthony Serrano	219
20	**General Public** John Moore	221
21	**General Public** John Moore	222
22	**Glendale Water & Power** Commenter: Michael E. De Ghetto, P.E.	229
23	**Heal the Bay** Commenter: Annelisa Ehret Moe	231
24	**Heal the Ocean** Commenter: Hillary Hauser	236
25	**Irvine Ranch Water District** Commenter: Paul Cook	243
26	**Los Angeles Department of Water & Power** Commenter: Katherine Rubin	249
27	**Main San Gabriel Basin Watermaster** Commenter: Anthony C. Zampiello	258

Recycled Water Policy Amendment
Response to Comments by Letter
Comment Deadline: 12:00 Noon on June 26, 2018

November 30, 2018

Letter No.	Organization / Group	Page Number
28	**The Metropolitan Water District of Southern California** Commenter: Mickey Chaudhuri	260
29	**Napa Sanitation District** Commenter: Timothy B. Healy	271
30	**Orange County Sanitation District** Commenter: Ron Coss	277
31	**Orange County Water District** Commenter: Jason Dadakis	286
32	**Padre Dam Municipal Water District** Commenter: Allen Carlisle	303
33	**Raymond Basin Management Board** Commenter: Anthony C. Zampiello	307
34	**RegionalSan, Sacramento Regional County Sanitation District** Commenter: Terrie Mitchell	309
35	**San Diego County Water Authority -** Robert Yamada **Helix Water District -** Brian Olney **Padre Dam Municipal Water District -** Allen Carlisle **Olivenhain Municipal Water District -** Kimberly Thomer **City of Oceanside -** Cari Dale **Santa Fe Irrigation District -** Cor Shaffer **Otay Water District -** Mark Watton **City of Escondido -** Christopher McKinney	333
36	**County Sanitation Districts of Los Angeles County** Commenter: Ann Heil	339
37	**Santa Ana Watershed Project Authority** Commenter: Mark Norton	387
38	**Santa Clara Valley Water District** Commenter: Norma Camacho	393

Recycled Water Policy Amendment
Response to Comments by Letter
Comment Deadline: 12:00 Noon on June 26, 2018

November 30, 2018

Letter No.	Organization / Group	Page Number
39	**South Orange County Wastewater Authority** Commenter: Amber Baylor	397
40	**Southern California Alliance of POTWs (SCAP)** Commenter: Steve Jepsen	403
41	**WaterReuse California** - Jennifer West **CASA** - Roberta Larson **ACWA** - Adam Borchard **CUWA** - Cindy Paulson **CMUA** - Jonathan Young	405
42	**Olivenhain Municipal Water District** Commenter: Kimberly A. Thorner	414
43	**TDC Environmental** Commenter: Kelly D. Moran	417
44	**Monterey One Water – Oral Comment at June 19, 2018 Hearing** Commenter: Mike McCollough	421
45	**Public – Oral Comment at June 19, 2018 Hearing** Commenter: Gordon Innes	423
46	**Central Valley Clean Water Association and Public – Oral Comment at June 19, 2018 Hearing** Commenter: Tess Dunham	424

No.	Comment	Response	Categories
1	**BACWA Bay Area Clean Water Agencies** **Commenter: David Williams**		
1.001	BACWA supports the efforts of the State Water Board to promote the use of Recycled Water via the Recycled Water Policy. Our comments provide recommendations on how to further streamline recycled water planning and permitting, and encourage new recycled water projects without introducing additional risk to public health.	This is the introductory statement to the comment letter, followed by Comments 1.002 to 1.053.	12. General Comment
1.002	The Proposed Amendment includes a new narrative goal (Section 3.1.2) to minimize the direct discharge of treated municipal waste water to enclosed bays, estuaries and coastal lagoons, and ocean waters, except where necessary to maintain beneficial uses. The proposed goal only provides exceptions for beneficial uses and brine discharge.	This response covers Comments 1.002 to 1.007 from this commenter. In response to comments received from various stakeholders, section 3.1.3 was added to the Amendment to include a goal to maximize the use of recycled water in areas where groundwater is in a state of overdraft, to the extent that downstream water rights, instream flow requirements, and public trust resources are protected. Section 4.5.1.2 of the Staff Report with SED was also revised to expand discussion of the narrative goal to minimize direct discharge to enclosed bays, estuaries and coastal lagoons, and ocean waters (hereafter, narrative goal), as well as factors that could impact the practicability of recycling treated wastewater instead of discharging it. Several commenters stated that the proposed narrative goal in the Amendment was coastal-specific and would result in prioritized funding for recycled water projects in coastal regions over inland regions. Other commenters stated that the narrative goal did not adequately consider the use of recycled water in agricultural regions. In response to these comments, a goal was added to the Amendment to “maximize the use of recycled water where groundwater is in a state of overdraft, to the extent that downstream water rights, instream flow requirements, and	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
		public trust resources are protected." The addition of this goal promotes the use of recycled water to augment water supplies in areas where groundwater supplies are limited. The addition of this goal may also support Groundwater Sustainability Plan efforts pursuant to the Sustainable Groundwater Management Act (SGMA), such as overdraft mitigation and basin recharge. Commenters recommended to either strengthen the narrative goal to "eliminate" rather than "minimize," or to soften the goal to "maximize." "Eliminate" would make a strong statement that treated wastewater is a valuable resource that should be used to augment existing water supplies; however, "minimize" achieves a similar purpose while inherently accounting for feasibility. Revising the goal to "maximize the use of recycled water" de-emphasizes the entity responsible for implementing the goal — coastal wastewater treatment facilities — and does not align as well with the State Water Board's historic emphasis on reducing discharges to coastal waters (for example, see Resolution No. 77-1, Policy with Respect to Water Reclamation in California). Maintaining the current language as "minimize the direct discharge" of treated wastewater retains the intent of the goal to encourage the use of recycled water, inherently considers the limitations of meeting the goal, and balances the commenters' suggestions. The narrative goal was not moved to the benefits section because it is intended to be a statewide goal rather than an ancillary benefit of increased recycled water use. The narrative goal aligns with the purpose of the Policy to encourage the use of recycled water and prioritizes the reuse of treated wastewater in coastal areas where energy-intensive water supply alternatives may include	

No.	Comment	Response	Categories
		desalination, groundwater extraction, or imported water. In addition, the narrative goal does not prescribe specific uses of recycled water over others; rather, it encourages the increased use of recycled water statewide. Lastly, the narrative goal does not prescribe numeric mandates that dischargers must meet. The narrative goal could not become a mandate without a full public process through a future Policy Amendment.	
1.003	We are concerned that the proposed goal does not account for the cost-effectiveness, feasibility and affordability of recycled water implementation and other site-specific conditions across jurisdictions. Whether recycled water is feasible and can be provided at reasonable cost are conditions specified in the California Water Code.	See response to Comment 1.002. The commenter does not indicate to which Water Code section they are referring. The commenter may be referencing Water Code section 13550, which defines waste and unreasonable use of potable water if recycled water is available that meets certain conditions, such as reasonable cost. The narrative goal does not fall under these provisions since it is a statewide goal to increase the use of recycled water by encouraging the reduction of treated wastewater directly discharged to saline waters. Furthermore, as this is a goal to "minimize" rather than "eliminate" the direct discharge of treated wastewater, the goal inherently accounts for cost-effectiveness and feasibility.	3. Goals, mandates, and reporting requirements
1.004	There is also concern that the goal will eventually evolve into a mandate via legislation.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
1.005	The goal to minimize discharge to the Ocean also appears to penalize irrigation recycled water projects, or other projects where demand is seasonal, compared to recycled water projects with year-round demand. In Regional Water Quality Control Board (Regional Board) Region 2, agencies are looking at recycled water irrigation projects as one of many tools to reduce nutrient loads to the San Francisco Bay.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	Irrigation reuse projects can also contribute toward meeting TMDLs for other contaminants		
1.006	For the reasons stated above, the proposed goal to minimize the discharge of treated municipal wastewater without consideration of affordability, cost-effectiveness, feasibility, and other site-specific conditions will not be achievable for all jurisdictions and agencies.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
1.007	BACWA recommends that this proposed goal be removed from the Policy, or at least moved to the "benefits" section of the Policy and reframed to maximize recycled water use.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
1.008	The State should encourage more water recycling by focusing on prioritizing funding for implementation of recycled water projects.	In section 3.4 of the Amendment, the State Water Board requests other state agencies to promote and streamline permitting and funding of recycled water projects to assist in achieving the statewide goals outlined in section 3. State and federal funds are allocated to specific projects consistent with the intended use of those funds. To the extent recycled water projects are eligible for those funds, the State Water Board collaborates with other funding agencies to prioritize recycled water projects as appropriate. In addition, section 4 of the Amendment describes the roles of various state agencies, including the State Water Board, in funding recycled water projects. The State Water Board funds recycled water projects through its Water Recycling Funding Program. The Water Recycling Funding Program promotes water recycling by providing technical and financial assistance to agencies and other stakeholders in support of water recycling projects and research, through grants and low-interest loans from funding sources, such as Proposition 1, Proposition 64, and the Clean Water State Revolving Fund. More information can be found on the Water Recycling	4. State agency roles

No.	Comment	Response	Categories
		Funding Program webpage: https://www.waterboards.ca.gov/water_issues/programs/grants_loans/water_recycling/	
1.009	Section 11.2 terminates permit coverage of non-potable recycled water uses under existing Regional Water Board general orders one year from the effective date of the Proposed Amendment. Under this section, Regional Water Boards are required to transition enrollees from these orders into Order WQ 2016-0068-DDW (General Order 2016) before that termination date.	Section 11.2 of the Amendment was revised to extend the termination date for permit coverage of existing regional water board recycled water general orders from one year to three years. In addition, a tiered approach was added to section 11.2 of the Amendment to require permittees with Title 22 Engineering Reports approved prior to January 1, 2001 to transition within three years; permittees with Title 22 Engineering Reports approved after January 1, 2001 would have one year to transition to another order. As discussed in section 4.15.2 of the Staff Report with SED, The Uniform Statewide Recycling Criteria for the protection of public health found in CCR, title 22, were last updated in December 2000, so Title 22 Engineering Reports approved after January 1, 2001 are expected to be consistent with the Uniform Statewide Recycling Criteria for the protection of public health. Furthermore, Section 11.2 of the Amendment does not require all enrollees of regional water board general orders to transition to Order WQ 2016-0068-DDW; rather, regional water boards are required to transition enrollees of current regional water board recycled water general orders to another permit, such as Order WQ 2016-0068-DDW. It is anticipated that many regional board general order enrollees will transition to Order WQ 2016-0068-DDW; however, it is appropriate to leave flexibility for the regional water boards to decide the appropriate permitting mechanism.	11. Permit review and update

No.	Comment	Response	Categories
1.010	The Proposed Amendment is silent on the process to be used by the Regional Boards for these transitions and does not appear to provide the additional resources needed by the Regional Boards to accomplish these transitions.	See response to Comment 1.009. It is the expectation of the State Water Board that the regional water boards will manage their resources to transition enrollees within the timeframe provided. The timelines stated in the Amendment account for resource availability, and the State Water Board plans to monitor progress towards meeting the timelines established in the Amendment. The State Water Board may adjust priorities, reallocate resources and identify additional resources as needed to ensure continuity of permit coverage. The regional water boards will use their existing permitting processes to transition enrollees from existing regional water board recycled water general orders to another permit.	11. Permit review and update
1.011	Region 2's General Order 96-011 has more than 25 enrollees. Most of these enrollees have been successfully operating under General Order 96-011, producing and delivering recycled water to their users with no issues for more than 15 years. Without additional staffing allocations, Region 2's staff is unlikely to be able to complete transitioning all 25+ agencies under General Order 2016 by the termination date. Discontinuity of permit coverage is a serious concern to BACWA member agencies. These agencies have invested heavily in infrastructure and most have been delivering recycled water to their customers for more than a decade.	See response to Comment 1.010.	11. Permit review and update
1.012	To avoid discontinuity in permit coverage, BACWA recommends the Proposed Amendment allow the current General Order 96-011 enrollees be automatically covered under General Order 2016 upon the effective date of the Proposed Amendment, or granted immediate coverage prior to the General Order 96-011 termination date. The automatic	It is not legally justified to automatically transition enrollees of San Francisco Bay Regional Water Quality Control Board Order 96-011 (Order 96-011) to Order 2016-0068-DDW, since enrollees did not provide consent to be automatically transitioned to another permit as a condition of Order 96-011. Order 96-011 enrollees may submit a Notice of Intent (NOI) to enroll in Order 2016-0068-DDW.	11. Permit review and update

No.	Comment	Response	Categories
	transition will ensure consistency with permit and monitoring standards.	Enrollees under State Water Board Order WQ 2014-0090-DWQ that provided written consent were automatically transitioned to Order 2016-0068-DDW, since the State Water Board determined that the orders were nearly identical. In contrast, Order 96-011 was adopted more than 20 years prior to the adoption of Order 2016-0068-DDW and four years prior to the most recent update to CCR, title 22 and may not be equivalent to Order 2016-0068-DDW. The State Water Board and regional water boards will work with permittees under existing regional water board recycled water general orders to streamline the transition process as applicable; however, this will be specific to each regional water board recycled water general order and is therefore not appropriate for inclusion in the Amendment.	
1.013	The Notice of Intent (NOI) included with General Order 2016 recognized that it was unnecessary for permittees already covered by an existing order authorizing water recycling to resubmit all the information previously submitted to obtain that prior coverage. Furthermore, the NOI allowed for <u>automatic coverage of enrollees covered under Order WQ 20140-0090-DWQ.</u> See the specific language as quoted below (NOI p. A-1): *"Applicants that have been previously issued an order authorizing water recycling may be able to submit an abbreviated information package. Such applicants should contact Regional Water Board and State Water Board staff to determine the application information needs.* *Enrollees covered under Order WQ 2104-0090-DWQ who wish to continue coverage must acknowledge in writing their consent to coverage under this General*	See response to Comment 1.012.	11. Permit review and update

No.	Comment	Response	Categories
	Order. Enrollees who submit the required documentation will automatically be covered under this General Order. The State Board will provide existing enrollees with a form for this purpose. A new NOI is not required if the project has not materially changed.		
1.014	BACWA respectfully requests that the following language be added to the end of Proposed Amendment Section 11.2 to clarify the transition process for enrollees covered under existing General Permits: *Enrollees covered under existing Regional Water Board general orders who wish to obtain coverage under General Order WQ 2016-0068-DDW, or its successor, must acknowledge in writing their consent to such coverage. Enrollees who submit the required documentation will automatically be covered under this General Order. The Regional Board or State Board staff will provide existing enrollees with a form for this purpose. A new NOI and/or updated Engineering Report is not required if the project has not materially changed.*	See response to Comment 1.012.	11. Permit review and update
1.015	BACWA questions the need for, and value to be derived from re-reviewing previously submitted and approved Engineering Reports for existing, operating recycled water projects that have not materially changed.	The Uniform Statewide Recycling Criteria for the protection of public health found in CCR, title 22, were last updated in December 2000. Guidelines for the preparation of an engineering report for the production, distribution, and use of recycled water were last updated in March 2001. Section 11.3.1 of the Amendment requires the State Water Board to review Title 22 Engineering Reports issued prior to January 1, 2001 to determine whether an updated Title 22 Engineering Report is needed to be consistent with the 2000 Uniform Statewide Recycling Criteria. Title 22 Engineering Reports approved prior to January 1, 2001 may not comply with these 18-year-old regulations for the protection of public health, and it is therefore appropriate	11. Permit review and update

No.	Comment	Response	Categories
		for the State Water Board to review these Title 22 Engineering Reports to ensure the protection of public health and the safe use of recycled water. Title 22 Engineering Reports approved after January 1, 2001 would not require review by the State Water Board unless the project has materially changed since the Title 22 Engineering Report was first approved.	
1.016	BACWA also requests that any Engineering Report review deemed necessary be deferred until SWB DDW staff have developed updated "Guidelines for the Preparation of an Engineering Report for the Production, Distribution, and Use of Recycled Water." The latest version was last updated March 2001. Updated guidelines are necessary to provide a transparent benchmark for how previously submitted reports will be evaluated for "consistency with all applicable regulations" per Proposed Amendment Section 11.3.1.	See response to Comment 1.015. The State Water Board does not plan to update its March 2001 guidance document for the preparation of Title 22 Engineering Reports. State Water Board review of Title 22 Engineering Reports is directed towards Engineering Reports approved prior to January 1, 2001.	11. Permit review and update
1.017	Section 3.4 of the Proposed Amendment requests that other State agencies use their respective authorities to increase the use of recycled water. We recommend that the Proposed Amendment recognize the need for additional funding assistance to facilitate the development of recycled water projects. The Proposed Amendment should request other State agencies to prioritize funding for recycled water projects. Other State agencies should also be encouraged to provide expedited and streamlined funding application reviews to facilitate implementation of recycled water projects.	See response to Comment 1.008.	4. State agency roles

No.	Comment	Response	Categories
1.018	Section 5 of the Proposed Amendment addresses wastewater change petitions that may be required pursuant to Water Code section 1211 if a recycled water project results in reduced stream flows. Most recycled water projects, certainly where the Producer is also regulated by an NPDES permit, will by definition result in a reduced volume of discharge to a receiving water body.	Clarifying changes have been made to section 5 of the Amendment. A wastewater change petition is required prior to changing the point of discharge, place of use, or purpose of use of treated wastewater that will decrease the flow in any portion of a watercourse. Project proponents should conduct an evaluation to determine whether a wastewater change petition should be filed and get concurrence from State Water Board Division of Water Rights (hereafter, Division of Water Rights) for that determination. A wastewater change petition is not required for all recycled water projects. A change petition is not required if the discharge is to a bay or ocean, or if the stream has never seen the flow in question (i.e., future flows). A wastewater change petition is also not required if the treated wastewater is currently discharged to land.	5. 1211 and WW Change Petitions
1.019	To encourage the expansion of recycled water, wastewater change petitions for recycled water projects should not be required under most circumstances, and the review of petitions should be streamlined and expedited. The Proposed Amendments should be revised to clarify that not "every" project triggers a full 1211 analysis, learning from the challenges resulting from overly broad language in the original Amendments stating the intent that "every" groundwater basin needed to develop a salt and nutrient management plan.	Clarifying changes have been made to section 5 of the Amendment. The Amendment, consistent with Water Code section 1211, states an approved change petition is required if a proposed recycled water project will result in reduced stream flows. See the response to Comment 1.018 for examples of when a wastewater change petition may not be required.	5. 1211 and WW Change Petitions
1.020	Specifically, the Proposed Amendment should include the following: There should be language about de *minimis* changes that can bypass the 1211 process. This may include recycled water projects that decrease discharges to tidal sloughs or projects that decrease discharges below a certain threshold (such as 10%).	There is no de minimis exemption provided in Water Code section 1211. See response to Comment 1.018 for examples of when a wastewater change petition may not be required.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
1.021	Division of Water Rights should improve coordination with the State Water Board's Division of Financial Assistance and other funding agencies, who already review the information required in wastewater change petitions as part of CEQA review or other permitting.	Division of Water Rights has the delegated authority to process and approve wastewater change petitions. DFA coordinates with Division of Water Rights to identify and process wastewater change petitions, including CEQA review for recycled water projects funded by the State Water Board. The State Water Board agrees that coordination with other funding agencies would help identify, at the planning stages of the project, if an approved wastewater change petition is needed and help reduce potential delays for project implementation while the Division of Water Rights is processing the petitions. The Amendment includes Water Code section 1211 requirements to help inform project proponents and other funding agencies of the Water Code section 1211 requirements.	5. 1211 and WW Change Petitions
1.022	There should be a streamlined review process for projects that reduce flows to streams or waterways where there is no downstream legal user, and projects where there has already been review of the downstream impacts of the wastewater treatment facility and recycled water program. The streamlined review should consider previous CEQA or other environmental review that evaluated impacts on instream uses at discharge rates that incorporate expected expansions of a facility's recycled water program.	Wastewater change petitions follow the petition process in Water Code section 1701. Projects are reviewed on a case-by-case basis. Projects in the situation described by the commenter may be processed on an expedited basis if sufficient information is available to determine that no legal user of the water will be injured by the change and that any potential environmental impacts will be properly mitigated. Prior analyses that are applicable to the subject discharge and watercourse may be utilized.	5. 1211 and WW Change Petitions
1.023	The State Water Board or Regional Board should identify streams where a cumulative impact analysis will be required for recycled water projects. A cumulative impact analysis should be the exception, not the norm.	As discussed in section 4.10 of the Staff Report with SED, effluent-dominated streams in Southern California are of greatest concern, although there may be other cases where reduced wastewater treatment plant discharges could result in a significant impact to public trust resources. CEQA also requires consideration of cumulative impacts.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
1.024	The Proposed Amendment requires Regional Boards to evaluate and prioritize groundwater basins for SNMP development based on the GAMA or CASGEM system, or more region-specific factors in basin evaluation (Section 6.1.3) that better represent conditions of the region. BACWA supports this proposed change that recognizes the importance of providing flexibility at the regional level to evaluate the need for SNMPs.	The commenter supports the Amendment language for basin evaluation; no change is requested.	6. Salt and nutrient management plans
1.025	The proposed approach for groundwater basin evaluation also more closely mirrors the CASGEM evaluation and ranking approach and is more likely to accurately prioritize basins on the basis of salt (TDS) and nutrient (nitrate) issues than the USGS/GAMA approach previously recommend by the State Water Board to the Regional Water Boards that incorporates number of leaking underground storage tanks and also pesticide use in its ranking.	See response to Comment 1.024.	6. Salt and nutrient management plans
1.026	BACWA believes that continued inclusion of SNMP requirements within the Recycled Water Policy is misplaced. Development and implementation of effective SNMPs needs to be part of a larger stakeholder effort to manage the quantity and quality of groundwater in California given the minimal contribution of salts and nutrients from recycled water projects compared to other sources in most basins. Staff report Figure 4-4 shows that the percent of water use from recycled water on a region-wide basis ranged from 1 to 17% with a median of 2%. Section 6.1.2 of the Proposed Amendment states that *"[s]alts 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"* and encourages water and wastewater entities, together with local salt and	When recycled water is used in accordance with the Policy and consistent with the Uniform Statewide Recycling Criteria, the environmental impacts of recycled water use are limited. However, as more recycled water projects come online, there may be environmental effects related to the combined impact of multiple projects, such as effects from constituents in the recycled water, including salts, nutrients, and CECs, or the discharge of waste streams associated with these facilities. Recycled water may contain elevated concentrations of salts and nutrients, which may have a negative effect on groundwater quality. This is of particular concern in areas where salts and nutrient concentrations exceed or threaten to exceed water quality objectives established for the groundwater basin. SNMP requirements are included in the Policy to address the challenge of permitting recycled water	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	nutrient contributing stakeholders, to collaboratively develop SNMPs for groundwater basins, as required.	projects and to streamline permitting of recycled water projects. This is in recognition of the fact that a basin- or subbasin-level analysis is more appropriate than a project-level analysis for each proposed recycled water project. See sections 3.4.3 and 4.8.4 of the Staff Report with SED and additional information provided in response to Comment 1.027 for a more complete discussion of this topic.	
1.027	The passage of SGMA in 2014 provides a new opportunity to move the salt and nutrient management planning component out of the Policy and into the broader reaching groundwater quantity and quality sustainability requirements of SGMA. SGMA was not available in 2009 when the Policy was adopted, so absent another clear "vehicle" the case was made at that time that salt and nutrient management planning should be incorporated into the Policy, with the understanding that all stakeholders contributing salts and nutrients to a given basin would need to be included in such efforts, not just recycled water producers and users.	As discussed in section 3.4.4 of the Staff Report with SED, there are certain opportunities to align the elements of a Groundwater Sustainability Plans (GSPs) with SNMP requirements. However, it is important to note the distinctions between SNMPs and SGMA, including differences in regulatory authority, basin prioritization, and requirements that are unique to SNMPs. The most significant difference between the state agencies is the plan approval roles for SNMPs and GSPs. The regional water boards have authority to approve SNMPs, while the Department of Water Resources (DWR) is responsible for reviewing GSPs and determining whether a GSP is adequate for the purposes of SGMA. Also, SGMA implementation is driven at the local level and provides GSAs a large amount of local flexibility. This deference for local flexibility means a GSA could use the SGMA process to meet the objectives of an SNMP and other regulatory programs, but it does not empower DWR to require GSAs to do so. Another distinction is that not every basin will be required to complete both an SNMP and a GSP. The Policy proposes that the regional water boards prioritize which basins need an SNMP, while SGMA relies on a prioritization process developed by DWR. Further, some basins have already started or completed SNMPs, while others have not.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
		Based on these (and other) factors, it is not appropriate to move the SNMP component out of the Policy and into SGMA. A more complete discussion of the relationship between SGMA and SNMP requirements is included in section 3.4.4 of the Staff Report with SED.	
1.028	In a similar manner, the 2009 Policy included stormwater and conservation goals which as noted in the staff report (p.34) *"while critically important, are broader than recycled water and the scope of the Policy."* Since the Policy was last amended, the State Water Board adopted the "Strategy to Optimize Resource Management of Storm Water (Storm Water Strategy or STORMS). As slightly paraphrased from the staff report (p. 34): *"With the development of STORMS and the conservation framework under Executive Order B-37-16, the State Water Board now has more appropriate programs and pathways to develop and oversee stormwater and conservation goals. B(b)ecause this goal would fit better in the Storm Water Strategy ... the goals were removed."*	This is a part of Comment 1.027; see response to Comment 1.027.	12. General Comment
1.029	Here in mid-2018, BACWA believes that it is appropriate that the same logic be applied to moving the majority of SNMP efforts from the Proposed Amendment to SGMA, which also didn't exist in 2009, with the Regional Water Boards retaining their individual authorities under the Water Code if water quality protections provided under SGMA- driven efforts are deemed insufficient.	See responses to Comments 1.026 and 1.027.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
1.030	As discussed in Section 3.4.4 of the May 9, 2018 staff report, *"Incorporating an SNMP into a GSP through application of the concepts discussed below may eliminate duplicative regulatory requirements and help encourage sustainable groundwater management."* The staff report further details the elements of GSPs (Groundwater Sustainability Plans) and SNMPs, and states that duplication can be avoided if GSAs (Groundwater Sustainability Agencies) incorporate salt and nutrient management planning into their GSPs, including requirements for a basin-wide monitoring plan and water budgets.	See response to Comment 1.027. A more complete discussion of the relationship between SGMA and SNMP requirements is included in section 3.4.4 of the Staff Report with SED.	6. Salt and nutrient management plans
1.031	BACWA supports inclusion of Section 6.2.1.4 in the Proposed Amendment allowing GSPs developed pursuant to SGMA to be found functionally equivalent to a SNMP.	The commenter supports the Amendment language for allowing the regional water boards to determine whether another plan is functionally equivalent to an SNMP; no change is requested.	12. General Comment
1.032	BACWA would respectfully request that the following sentence be added to the end of Section 6.2 to help ensure that Regional Water Board local basin evaluations be incorporated into salt and nutrient planning efforts by other groups: *"The State Water Board also encourages stakeholders to incorporate into their salt and nutrient planning efforts the basin evaluation information developed by each regional water board pursuant to Section 6.1.3."*	Section 6.2.1 of the Amendment was revised to reflect the requested change.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
1.033	For the reasons discussed above, we respectfully disagree with staff's recommendation to keep the SNMP program housed within the Recycled Water Policy and recommend that the Proposed Amendment include a requirement for the State Water Board to work with DWR and other stakeholders to develop a policy or agreement for migrating the SNMP program into SGMA. We believe that staff's recommendation places too much emphasis on the administrative challenges of this option, rather than evaluating whether SGMA is a more appropriate program and pathway to develop and achieve the goals of salt and nutrient management planning.	See responses to Comments 1.026 and 1.027.	6. Salt and nutrient management plans
1.034	Removing the SNMP requirements from the Policy and placing them into SGMA does not alter the State Water Board's authority over water quality.	As discussed in section 3.4.4 of the Staff Report with SED, the distinctions between SNMP requirements and SGMA that limit the ability to incorporate the SNMP program into SGMA do not include a concern regarding State Water Board authority. Rather, differences in regulatory authority, basin prioritization, and requirements unique to SNMPs are the main factors behind the recommendation that SNMPs remain in the Policy. See responses to Comments 1.026 and 1.027 for additional discussion related to this topic.	6. Salt and nutrient management plans
1.035	Section 6.2.1.5 of the draft Policy clearly states that a Regional Board maintains its authority pursuant to Water Code Section 13242 to adopt plans and programs of implementation for the protection of beneficial uses in the basin. Migrating the SNMP program into SGMA would not change this authority.	See response to comment 1.027.	6. Salt and nutrient management plans
1.036	BACWA supports the centralization of recycled water reporting. In addition to tracking progress toward statewide goals, having reliable, consistent recycled water data from agencies will be instrumental in regional water management planning.	The commenter supports Amendment language relating to recycled water reporting; no change is requested.	12. General Comment

No.	Comment	Response	Categories
1.037	However, some of the benefits of centralizing and streamlining reporting are lost if recycled water via other reporting avenues are not discontinued.	The State Water Board plans to develop a statewide system to streamline reporting of volume of wastewater and recycled water, pursuant to the requirements of section 3.2 of the Amendment. The State Water Board intends to avoid duplicative reporting where possible. Additionally, the State Water Board supports the elimination of duplicative reporting requirements to other state agencies and will make these recycled water volume data available to other state agencies and the public. Some recycled water permits require data to be reported in CIWQS, while others require data to be reported to GeoTracker. Due to the complexity of existing reporting requirements, a survey tool that is compatible with both CIWQS and GeoTracker will be used. This survey tool is under development and will be designed to prioritize ease of use and streamline reporting of the required data. The State Water Board will explore the possibility of the survey tool querying existing CIWQS or GeoTracker data to avoid duplicative data entry. Stakeholders who have expressed interest will be consulted during the development of this tool.	3. Goals, mandates, and reporting requirements
1.038	The State Water Board should implement recycled water reporting via CIWQS, rather than developing a new, redundant database system. Staff's proposed approach to develop a new recycled water database and then eliminate redundant reporting requirements within CIWQS is unworkable.	See response to Comment 1.037.	3. Goals, mandates, and reporting requirements
1.039	Agencies already report most influent, effluent, and total recycled water production data required by the Proposed Amendment into the CIWQS database as required by their NPDES Permit. Future reporting requirements should be integrated into the existing CIWQS reporting system, rather than requiring double reporting.	See response to Comment 1.037.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
1.040	BACWA has experience collecting recycled water data from our member agencies, and understands the difficulties inherent in getting a clear picture of recycled water flows, while avoiding double counting. BACWA would be happy to work with State Water Board staff to give input into database development and help test-drive input forms.	See response to Comment 1.037. The State Water Board looks forward to working with BACWA staff on the development of a statewide system for the tracking of recycled water use.	12. General Comment
1.041	BACWA cautions that the collection of influent flow data may be misleading. If the State Water Board plans to compare influent flows to the flow of effluent discharged and recycled water produced, factors such as in-plant use of recycled water, and other unknown facility-specific factors, would cause those numbers to be inconsistent. The possible confusion resulting from reporting influent flows and comparing them to other flows outweighs any usefulness of the influent data.	The State Water Board recognizes that, to a certain extent, the volume of influent reported may not equal the volume of treated wastewater produced, discharged, and reused because of on-site use and volume not reclaimable (e.g., volume of solids). On-site use of treated wastewater is exempt from the requirements of CCR, title 22 pursuant to CCR, title 22, Div. 4, Ch. 3, §60303, so it was not included in the 2015 municipal wastewater recycling survey or this Amendment. However, the recycled water use tracking tool is still under development, and this comment will be considered during construction of the tool. Section 3.2. of the Amendment is revised to allow for fine tuning of the reporting details when the Executive Director issues the Order to require reporting of this data.	3. Goals, mandates, and reporting requirements
1.042	Pursuant to the above paragraph, BACWA also recommends that “in-plant use” be added as a recycled water use, both to aid in recycled water flow accounting, as well as to count toward the State Water Board’s recycled water goals.	See response to Comment 1.041.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
1.043	The Proposed Amendment removes the monitoring requirements for priority pollutants from the Recycled Water Policy. Priority pollutants are largely industrial chemicals whose uses have diminished since they were incorporated into regulation over four decades ago. State Water Board staff reviewed priority pollutant monitoring data and concluded that exceedance rates are extremely low. The Proposed Amendment correctly shifts monitoring resources from historic pollutants to emerging contaminants and their potential impacts to potable recycled water projects.	The commenter is in support of removing priority pollutant monitoring for landscape irrigation recycled water projects from the Amendment; no change is requested.	7. Permitting for Non-Potable
1.044	Additionally, recycled water is produced from POTW effluent. POTWs will still need to conduct effluent priority pollutant monitoring to satisfy their NPDES permits or WDRs.	See response to Comment 1.043.	7. Permitting for Non-Potable
1.045	BACWA appreciates the removal of duplicative and misaligned monitoring requirements. We recommend that, prior to any deadline requiring the enrollment of new permittees, the Order WQ 2016-0068-DDW Monitoring and Reporting Program be revised to remove priority pollutant monitoring.	To implement this Amendment, the State Water Board Executive Director will issue an order pursuant to Water Code sections 13267 and 13383 to update monitoring and reporting programs for recycled water and wastewater permits statewide to be consistent with the Amendment. This order will remove priority pollutant monitoring requirements from landscape irrigation recycled water projects where that monitoring is not separately required (e.g., for NPDES permit requirements). Regional water boards will further ensure this requirement has been removed when implementing section 11.3 of the Amendment.	7. Permitting for Non-Potable
1.046	The Proposed Amendment, Attachment A, Section 1.1, requires the development of a Quality Management System for monitoring constituents of emerging concern (CEC). Using an Environmental Laboratory Accreditation Program (ELAP) certified laboratory obviates the requirements related to Quality Management Systems.	When the Panel reviewed the implementation of their recommendations from 2012, one of the areas of concern was the lack of quality assurance measures associated with the CEC monitoring. The Panel recommended improving the quality assurance procedures and measures associated with the CEC monitoring to ensure the data are	10. CECs and Attachment A

No.	Comment	Response	Categories
		reliable, repeatable, accurate and precise. The Amendment originally included section 1.1 to address this concern. However, the public comments identified concerns with including the National Environmental Laboratory Accreditation Conference Institute (TNI Standard) language since the State Water Board has not adopted the TNI Standard. The Amendment and Staff Report with SED were revised to remove the Quality Management System (TNI Standard) language and all references to a Quality Management System (QMS). However, merely requiring ELAP accreditation does not address the scope of quality assurance measures associated with CEC monitoring at a recycled water treatment plant. To address concerns regarding data quality, Attachment A was revised to clarify that the recycled water producer or project proponent shall develop a QAPP and submit it to the regional water board for review and approval prior to conducting sampling for the monitoring requirements in Attachment A. A QAPP is an outline of the performance criteria, procedures, and measures to ensure the program is meeting quality objectives and goals, including generating and reporting data of known and documented quality. QAPP is now defined in the Definitions section of the Amendment based on the USEPA definition from: USEPA. 2002. Guidance for Quality Assurance Project Plans. EPA QA/G-5. EPA/240/R-02/009: https://www.epa.gov/sites/production/files/2015-06/documents/g5-final.pdf The Amendment now includes language requiring a recycled water producer to develop a QAPP consistent with the U.S. EPA guidelines. Attachment A also includes	

No.	Comment	Response	Categories
		subsections to consider when developing the QAPP, including Selection of Analytical Methods (1.1), Laboratory Selection and Demonstrations of Competency (1.2), and Data Submission (1.3). Section 4.14.4 of the Staff Report with SED now includes additional discussion and reference materials for developing a QAPP. Tables 1 and 3 of Attachment A include monitoring and reporting requirements for CECs and bioanalytical screening tools. While there are analytical methods available for these constituents (see Tables 4-3 and 4-5 in the Staff Report with SED), ELAP accreditation may not be available for all of the constituents at the time monitoring is required to begin. However, lack of available ELAP accreditation does not preclude a program from generating CEC monitoring data of known and documented quality. The development and implementation of a QAPP will address the concerns related to data quality, including demonstrating that the laboratories are able to generate quality data that meet the data quality objectives in the QAPP (see revised Section 1.2 of Attachment A). To ensure adequate protection of public health, it is important for a recycled water producer that is generating recycled water for groundwater recharge or reservoir water augmentation to screen for the CEC Monitoring Parameters in Attachment A whether or not the methods or analytes are accredited by ELAP at the time that monitoring is required to begin. We encourage the use of ELAP accredited labs and included the following language in section 1.2 of the Amendment, *"A laboratory providing analyses of CECs and bioanalytical screening tools must hold a valid certificate of accreditation from the State of California Environmental Laboratory Accreditation Program (ELAP) for the analytical test*	

No.	Comment	Response	Categories
		methods or analytes selected, if such methods or analytes are accredited by ELAP at the time that monitoring is required to begin. If ELAP accreditation for analytical test methods or analyte becomes available after monitoring is initiated, then the laboratory providing analysis of CECs shall be accredited by ELAP for those methods or analytes within one year of such accreditation becoming available. If ELAP accreditation is unavailable for a method or an analyte, the recycled water producer should use a laboratory that has been accredited for a similar analytical method, instrumentation, or analyte until ELAP accreditation becomes available." Stakeholders also raised concerns about availability of laboratories to conduct the analyses required in Attachment A. The language above provides flexibility for utilities to use in-house labs or other labs without being ELAP accredited if accreditation for those methods or analytes are not available, as long as the laboratory can demonstrate it meets the data quality objectives and other quality assurance measures in the QAPP.	
1.047	Attachment A, Section 1.1.1, states that laboratories *"Comply with the management and technical requirements applicable to their operations in accordance with The National Environmental Laboratory Accreditation Conference Institute (TNI) 2016 Standard Volume 1, Module 2…"* The TNI is not yet adopted as the accreditation standard in California. If a laboratory is ELAP accredited, then the laboratory will be compliant with TNI requirements once they are adopted.	See response to Comment 1.046.	10. CECs and Attachment A

No.	Comment	Response	Categories
1.048	BACWA recommends that the Proposed Amendment Attachment A, Section 1.1 be replaced with the simple requirement that laboratories be accredited, and that all references to TNI be removed.	See response to Comment 1.046.	10. CECs and Attachment A
1.049	For CECs analysis, Attachment, Section 1.2.1 states that, *"The State Water Board views the use of drinking water methods as most appropriate, since they are generally more sensitive than wastewater methods. However, this may not always be possible, since there may be characteristics of recycled water (e.g., high total dissolved solids) that may make the use of drinking water methods impractical. A laboratory providing analysis of CECs shall be accredited by the Environmental Laboratory Accreditation Program (ELAP) for whichever method is selected based on (1)-(4) below, if such accreditation is available at the time that monitoring is required to begin. Any modifications to the methods shall be submitted to the State Water Board for review and subsequently submitted to the regional water board in an updated quality assurance project plan."* BACWA recommends that instead of individual agencies modifying methods and trying to validate them, the State Water Board develop methods through their Science Advisory Panel on CECs and require agencies to consistently follow a standard method. This would address the scenario when ELAP does not include a method within their scope of accreditation.	Section 1.2.1 of Attachment A that included the hierarchical selection of analytical methods was removed and section 1 was revised to include section 1.1 Selection of Analytical Methods. The Amendment now requires a laboratory to use an analytical method that has been validated for the analytes in the applicable matrix (e.g., drinking water, waste water) and can meet the required reporting limits. In general, if the water is treated to tertiary standards, wastewater methods are likely the most appropriate and if the water is the final advanced treated product water, drinking water methods are likely most appropriate. In some cases, a method may be validated and approved for use for drinking water and wastewater. The QAPP should specify which samples should be analyzed using drinking water methods vs. wastewater methods. See response to Comment 1.046 regarding requiring ELAP accreditation for the analytical methods for CEC monitoring. The development and implementation of the QAPP will ensure that a program is using analytical methods that can meet the established data quality objectives (e.g., reporting limits) and that they are using labs that demonstrate competency in running the analytical methods and can meet the data quality objectives in the QAPP. The State Water Board will continue to work towards approving analytical methods for use for the CECs in Table 1 and bioanalytical screening tools in Table 3, and to make ELAP accreditation available for those analytical methods or analytes, as appropriate. The State does not currently	10. CECs and Attachment A

No.	Comment	Response	Categories
		have a program with resources allocated to method validation and approval or conducting interlaboratory calibration studies to develop methods that are approved for statewide use. But the Amendment does not require that the CEC Monitoring Parameters are analyzed using a state-approved method. It has flexibility to use any analytical method that has been validated for the analytes in the applicable matrix that can achieve the reporting limits in Table 1 and Table 3 (see section 1.1 of Attachment A). If a validated and approved method is unavailable, Water Board staff can review a data validation package and approve the use of a method to analyze for the constituents in Table 1 and Table 3.	
1.050	BACWA has two recommended changes for the "Definitions" section: Tidally influence streams should be differentiated from those that have potential MUN use.	A definition for tidally influenced streams was not included in the Amendment as the Amendment does not include use of the term "tidally influenced stream," and the Definitions section includes only terms found throughout the Amendment to improve clarity. The commenter may be referencing the definition of "estuaries and coastal lagoons" in the Amendment. This definition was not altered because it is consistent with the definition included in the Water Quality Control Plan for Ocean Waters of California. To avoid confusion and maintain consistency between statewide plans and policies, it is not appropriate to deviate from the definition included in the Water Quality Control Plan for Ocean Waters of California.	14. Definitions
1.051	The definition for "Estuaries and coastal lagoons" should consider sloughs subject to tidal influence.	The definition of estuaries and coastal lagoons is consistent with the California Ocean Plan, which does not consider tidal sloughs to be part of estuaries and coastal lagoons.	14. Definitions

No.	Comment	Response	Categories
1.052	In addition to the broad comments listed above, BACWA has two proposed minor modifications: In this and other State Water Board materials, Reverse Osmosis (RO) Concentrate should not be called "brine" unless it results from an ocean or highly brackish water desalination process. RO Concentrate from a recycled water project has a total dissolved solids in the range of 4,000 to 6,000 mg/L, compared to 35,000 mg/L in seawater. This distinction impacts how it may be treated or discharged.	No changes were made in response to this comment because the reference to brine discharges is intended to distinguish highly saline discharges from less saline discharges that may be more efficiently reclaimed. The term "brine" is used in the Amendment twice: once in section 3.1.2 and once in section 8.1.5. In both instances, the term is used to describe discharges that are unreclaimable and therefore not considered potential for recycled water. This meaning will hold true regardless of treatment method (e.g., reverse osmosis).	3. Goals, mandates, and reporting requirements
1.053	In Section 8.1.5, BACWA recommends that all groundwater recharge projects, not just those using surface spreading, should be eligible for expedited permitting.	The State Water Board supports all allowable methods of groundwater recharge as regulated under CCR, title 22. However, groundwater recharge projects using reverse osmosis as a treatment mechanism are eligible for expedited permitting due to the additional level of treatment beyond the required tertiary disinfection.	8. Permitting for GWR
2	**California Coastkeeper Alliance** **Commenter: Sean Bothwell**		
2.001	Most cities in California use water once then dispose of it like waste at tremendous environmental and economic cost. Approximately 12 billion gallons of treated wastewater are discharged into the ocean or an estuary each day. Water recycling offers a significant untapped water supply, particularly in coastal areas facing water shortages that rely on imported water or are considering costly ocean desalination.	This is the introductory statement to the comment letter, followed by Comments 2.006 to 2.103.	12. General Comment

No.	Comment	Response	Categories
2.002	CCKA has been a long-time champion of ensuring water recycling is protective of the environment, that it is used in a reasonable and drought-resilient manner, and that we prioritize resources towards advancing potable reuse. In 2009, CCKA served on the stakeholder working group to develop California's Water Recycling Policy, which among other things, set a state goal to increase water recycling by approximately two million acre-feet per year by 2030. CCKA has since worked with the State Water Board to adopt a clear and consistent regulatory pathway to help California's water agencies meet its water recycling goals. CCKA also supported legislation, Senate Bill 918 Senate Bill 322 and Assembly Bill 574, requiring California to assess the feasibility and develop regulations for potable recycled water.	This is the introductory statement to the comment letter, followed by Comments 2.006 to 2.103.	12. General Comment
2.003	The local Waterkeepers are also champions for promoting potable reuse. Orange County Coastkeeper was a strong supporter of the Orange County Groundwater Replenishment System – the world's largest highly advanced purified water recycling system. San Diego Coastkeeper was a strong champion of potable reuse during the approval of San Diego's Pure Water Project. And Los Angeles Waterkeeper has supported large-scale potable reuse at the Hyperion plant that discharges nearly 250 MGD to the Pacific Ocean, Los Angeles's Groundwater Replenishment (GWR) Project that will provide up to 30,000 acre-feet per year (AFY) – more than 9.7 billion gallons – of purified water by 2023 to replenish the San Fernando Groundwater Basin, as well as a recently- approved pilot project being pursued by the Metropolitan Water District to determine the viability of up to 150MGD of water reclamation at the Joint Water Pollution Control Plant in Carson.	This is the introductory statement to the comment letter, followed by Comments 2.006 to 2.103.	12. General Comment

No.	Comment	Response	Categories
2.004	While CCKA strongly supports potable reuse, we have growing concerns regarding the use of non-potable reuse. CCKA advocates for environmentally protective non-potable reuse regulations and has fought for rigorous monitoring for chemicals of emerging concern (CECs). In 2012, CCKA worked to prevent AB 2398, an omnibus bill that aimed to remove the Water Boards' oversight of recycled water by no longer considering it a "waste" under the Water Code. And during California's drought, CCKA and the California Waterkeepers have stressed the need to use recycled water reasonably – particularly when Proposition One funding is involved.	This is the introductory statement to the comment letter, followed by Comments 2.006 to 2.103.	12. General Comment
2.005	The original Recycled Water Policy was adopted 9 years ago, and in that time, California has made great strides in recycled water. Science and technology has advanced to where we now have confidence in recycling water to drinking water standards that are protective of public health. Communities have moved past fearing "toilet-to- tap", to now prioritizing potable reuse over purple pipe projects. California passed Proposition 1 that appropriated $625 million towards recycled water, while the State Water Board provided extremely low interest loans. The Legislature has passed numerous pieces of legislation that removes barriers to recycled water and pushes the State Water Board to adopt potable reuse standards in a timely manner. And maybe most importantly, California survived a historic drought that forced us to value every drop of water and use it reasonably while not wasting such a valuable resource.	This is the introductory statement to the comment letter, followed by Comments 2.006 to 2.103.	12. General Comment
2.006	The Amendment is California's opportunity to re-evaluate our priorities and encourage water recycling be put to a beneficial use while ensuring it is used reasonably and protective of both public and aquatic	Language is provided under section 3.3.2 of the Amendment requiring that recycled water use be put to beneficial uses. The use of recycled water that would affect the availability of water for beneficial uses of water downstream of a discharge point is pursuant to the	2. Benefits of recycled water

No.	Comment	Response	Categories
	health. To this end, the State Water Board should: Expressly state that all recycled water in California must be used for beneficial uses and used reasonably and not wastefully, and that the reasonable beneficial requirement shall be incorporated into all permits governing recycled water;	provisions of Water Code section 1211, which requires the owner of any wastewater treatment plant to obtain the approval of the State Water Board prior to making any change in the point of discharge, place of use, or purpose of use of treated wastewater. Water Code section 275 gives the State Water Board broad discretion to "take all appropriate proceedings or actions before executive, legislative, or judicial agencies to prevent waste [or] unreasonable use." The State Water Board elects to exercise this discretion on a case-by-case basis in the context of recycled water. Including the suggested requirement in recycled water permits is unnecessary to carry out this discretionary action. The California Constitution prohibits the waste and unreasonable use of water. (Cal. Const., art. X, § 2.) But this provision does not mandate that the State Water Board has a non-discretionary duty to enforce it. Agencies have prosecutorial discretion to decide when to enforce a law. (E.g., *Heckler v. Cheney* (1980) 470 U.S. 821, 830-831.) Similarly, this provision does not mandate that the State Water Board must preemptively enforce this Constitutional provision when adopting a water quality control policy. Water Code section 275 gives the State Water Board broad discretion to "take all appropriate proceedings or actions before executive, legislative, or judicial agencies to prevent waste [or] unreasonable use." (§ 275.) Case law has uniformly interpreted Water Code section 275 to affirm the State Water Board's expansive discretionary authority to prevent waste and unreasonable use, but none speak of a mandatory duty. (e.g., *Light v. State Water Resources Control Bd.*(2014) 226 Cal.App.4th 1463 at pp. 1481–1482.) (See also, *R & P Growers Assn. v. Agricultural Labor Relations Bd.* (1985) 168 Cal.App.3d 667, 680	

No.	Comment	Response	Categories
		[statute providing that an agency "shall" impose an "appropriate" remedy implies the agency has discretion].)	
2.007	Set a statewide goal of eliminating treated ocean wastewater discharges;	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
2.008	Require each recycled water project to conduct a site-specific antidegradation analysis, but in the alternative, ensure Salt and Nutrient Management Plans and General Reclamation Orders have legally sufficient antidegradation analyses;	Section 8.2.1 of the Amendment states that each groundwater recharge project requires a site-specific antidegradation analysis. An antidegradation analysis for non-potable use projects that are enrolled in Order WQ 2016-0068-DDW is included in that order. In response to this comment, section 7.3 of the Amendment was revised to remove the streamlined permitting criteria. As a result, non-potable projects that are not permitted under Order WQ 2016-0068-DDW will need to conduct a site-specific antidegradation analysis unless these projects are within a basin with a basin plan amendment based on an accepted SNMP. In that case, compliance with the Antidegradation Policy may consist of an analysis demonstrating that the project is consistent with the adopted basin plan amendment. Language was added to the Amendment to state that if a project is not consistent with the adopted basin plan amendment as determined by the regional water board, compliance with the Antidegradation Policy may be based, in part, on the technical findings of the salt and nutrient management plan or basin plan amendment, as applicable. Section 6.2.4.5 of the Amendment provides that an SNMP must include an antidegradation analysis demonstrating that the existing projects, reasonably foreseeable future projects, and other sources of loading to the basin included within the plan will, cumulatively, satisfy the requirements of the Antidegradation Policy. Also see response to Comment 2.051.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
2.009	Maintain the incorporation of the bioanalytical screening methods into the CEC Monitoring Program and invest in research to expand a bioscreening toolbox;	The Amendment includes monitoring requirements for bioanalytical screening tools ER-α and AhR. Section 4.14.2 of the Staff Report with SED now includes a discussion of bioanalytical next steps. The State Water Board is developing a grant agreement in collaboration with SCCWRP and the Water Research Foundation to continue developing *in vitro* cell bioassays with additional physiological endpoints for screening CECs. Section 10.1.3 of the Amendment includes stated support for continued CEC research, including improving CEC screening tools.	10. CECs and Attachment A
2.010	Reconvene the Expert Panel every three years and streamline the process by incorporating the Expert Panel's procedural recommendations on creating a flexible and responsive CEC Monitoring Program;	The Amendment includes a provision for the State Water Board to reconvene the Panel every five years. The Water Boards currently do not have resources to reconvene the CEC Panel every three years. However, the State Water Board intends on working with the regional water boards to address the Panel's recommendations for programmatic improvements to more effectively assess and address CECs (e.g., requirement to report data electronically) through the CEC Initiative (see section 4.14.6 of the Staff Report with SED, Programmatic Changes to Address CECs and the CEC Initiative). The Panel's Final Report recommended programmatic changes at the Water Boards to assist the Water Boards in developing a flexible and responsive CEC Program. The Amendment incorporated some of these programmatic changes, including a requirement to electronic report the CEC monitoring data. The data will be stored in a publicly-accessible database (e.g. CIWQS), which should increase the amount of data available and increase data accessibility. The process of updating the CEC monitoring requirements in Attachment A to the relevant permits will be streamlined through development of a statewide order pursuant to	10. CECs and Attachment A

No.	Comment	Response	Categories
		Water Code section 13267 and 13388, rather than the typical process of the regional water boards updating the monitoring and reporting program for each permit. However, data will not be immediately available because there is a one-year grace period to give facilities time to prepare their quality assurance project plans and to budget for the updated monitoring requirements. But the intent of implementing the CEC monitoring requirements through a statewide order is to expedite the process for having the CEC data available for staff and the Panel to evaluate. If the Panel is reconvened every three years, by the time the Policy is amended, the monitoring requirements become effective, and recycled water producers start collecting data, there may be limited monitoring data for the Panel to evaluate. As the State Water Board anticipates the programmatic improvements and electronic reporting of CEC data will increase the amount and accessibility of the data. The State Water Board could re-evaluate the frequency of convening the Panel in a future amendment to the Policy or reconvene the Panel sooner than five years if additional resources become available. The Water Boards are working to establish a statewide CEC management strategy through the CEC Initiative, which is further described in section 4.14.6 of the Staff Report with SED, Programmatic changes to Address CECs and the CEC Initiative. The statewide CEC Initiative intends to implement many of the 2018 Science Advisory Panel's recommendations and work towards creating a flexible and responsive CEC Monitoring Program within the available resources of the Water Boards.	

No.	Comment	Response	Categories
2.011	Direct future Expert Panels to develop monitoring protocols to detect CECs that impact aquatic health and provide the resources necessary to develop a marine and inland surface waters CEC monitoring protocol that is protective of aquatic health;	The State Water Board is collaborating with the Ocean Protection Council to reconvene the Science Advisory Panel on CECs in aquatic ecosystems. We anticipate the Panel will be convened in early 2019 to make recommendations for CEC monitoring in enclosed bays, estuaries, inland surface waters, and ocean waters. The State Water Board can consider appropriate actions following the aquatic ecosystems Panel report, which may include working with stakeholders, regional water boards, and other agencies to develop a marine and inland surface waters CEC monitoring protocol. Section 4.14.6 of the Staff Report with SED was updated to include a discussion of reconvening the CEC Panel for aquatic ecosystems.	10. CECs and Attachment A
2.012	Direct future Expert Panels to investigate the risk and potential health exposure of cumulative CECs at low levels;	In the future, Science Advisory Panels on CECs may consider incorporating additional complexities into the risk-based framework, including mixture effects or a class-based approach as more information is available on these approaches. One of the reasons the Panel recommended using bioanalytical screening tools is because they can integrate the effects of all the chemicals present in the mixture as well as the effects of low concentrations of CECs and provide information on whether low levels of CECs will result in a physiological response. The State Water Board continues to invest in and develop these bioanalytical screening tools to target a suite of physiological endpoints, and capture interactions, both synergistic and antagonistic.	10. CECs and Attachment A

No.	Comment	Response	Categories
2.013	Direct future Expert Panels to make specific no-regrets recommendations for the State Water Board to implement to detect and control antibiotic resistant bacteria and antibiotic resistance genes in non-potable reuse;	In section 10.2.5.6, the Amendment states that each Science Advisory Panel report shall address: "Recommendation regarding antibiotic resistant bacteria and antibiotic resistance genes." The 2018 Science Advisory Panel's recommendations on antibiotic resistant bacteria were based on the best available scientific information, underwent scientific peer review, and can be updated by the Panel as scientific research continues to emerge. In addition, several studies cited in the California Coastkeeper Alliance comment letter were reviewed and contemplated by the 2018 CEC Panel prior to their final recommendations. The Panel's discussion of ARB/ARGs and their rationale for their recommendations can be found in Chapter 8 of their final report. The Panel included their research recommendations in section 8.6 for ARB and ARGs in recycled water applications in California. For additional discussion, see the response to peer review comments for Conclusion 7 and the text that was added to sections 4.14.5 and 4.14.6 of the Staff Report with SED.	10. CECs and Attachment A
2.014	Require any recycled water project proponents within a basin where a salt and nutrient management plan has not been accepted by the regional water board to conduct a site-specific antidegradation analysis;	See response to Comment 2.008.	6. Salt and nutrient management plans
2.015	Provide specific examples or guidance for the Regional Board to determine where salt and nutrient management plans are not a threat to water quality;	Section 6.1.3 of the Amendment requires regional water boards to consider several factors when conducting this evaluation. Additionally, the State Water Board will support regional water boards in their evaluations of basins for whether SNMPs are needed. See also response to Comment 2.093.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
2.016	Require Regional Boards to assess salt and nutrient management plans and evaluate monitoring data concurrently every 5 years;	Section 6.2.6 of the Amendment was revised to require reviews at a maximum of every 5 years unless an alternate timeline has been established in a basin plan amendment.	6. Salt and nutrient management plans
2.017	Continue to require Regional Board's to incorporate salt and nutrient management plans into Basin Plans;	The Amendment does not remove the requirement to incorporate SNMPs into basin plans. As stated in section 6.2.2 of the Amendment, "the regional water board shall consider for adoption a basin plan amendment when implementation of a salt and nutrient management plan involves adoption and/or modification of water quality objectives, beneficial uses, or programs of implementation consistent with Water Code sections 13240, 13241 and 13242." Several SNMPs that have been prepared conclude that, based on their evaluation of the water and salt and nutrient balance in the basin, water quality objectives for salts or nutrients are not exceeded or threatened to be exceeded in the basin. A basin plan amendment is not necessary to implement these SNMPs since implementation of these SNMPs does not involve adoption or modification of water quality objectives, beneficial uses, or programs of implementation consistent with Water Code sections 13240, 13241, and 13242. Section 6.2.3 of the Amendment describes the process for accepting these SNMPs and clarifies that, once accepted through this process, the SNMP will serve as a technical document to support future regional water board decisions.	6. Salt and nutrient management plans
2.018	Continue to require reporting of water recycling data and direct staff to develop a publicly accessible dashboard of the reported influent, the amount of recycled water, and the amount of treated wastewater discharged; and	See response to Comment 1.037. The reporting requirements prescribed in section 3.2 of the Amendment will be available on a publicly accessible database.	3. Goals, mandates, and reporting requirements
2.019	Continue to incorporate the clarification that all recycled water permittees comply with Water Code Section 1211.	The commenter is in support of Amendment language related to Water Code section 1211; no change is requested.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
2.020	THE STATE WATER BOARD SHOULD SET A STATEWIDE GOAL OF ELIMINATING TREATED OCEAN WASTEWATER DISCHARGES. Most California communities use water once then dispose of it like waste, at tremendous environmental and economic cost. Today's water recycling technology allows us to treat and reuse those wasteful discharges, helping reduce energy consumption, increase water security, and meet California's constitutional obligations. The State Water Board should set a statewide policy goal that we strive to eliminate treated ocean wastewater discharges and instead reuse it and put it to a beneficial use as a water supply.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
2.021	*Climate change and the California Constitution should drive California to eliminate the wasteful discharge of treated wastewater.*	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
2.022	California's wastewater has historically been treated solely as waste – used once, treated, and then disposed of through offshore dumping. As a result, approximately 12 billion gallons of treated water are wastefully discharged into the ocean or California estuaries each day. California's 'pump and dump' approach to water management is increasingly at odds with the state's hydrologic reality. As climate change creates hotter, drier conditions and reduces the storage capacity of the Sierra snowpack, the need to prevent water waste is more critical than ever.	See response to Comment 1.002. Section 2.3 was added to the Amendment to include climate change mitigation as a benefit of the use of recycled water.	12. General Comment

No.	Comment	Response	Categories
2.023	Our wastewater management is also increasingly at odds with the law. The California Constitution prohibits any waste and unreasonable use of a water resource. In this increasingly water-scarce state, ocean wastewater discharges arguably constitute a 'wasteful and unreasonable' use of water, illegal under the state Constitution.	See responses to Comments 1.002 and 2.006.	3. Goals, mandates, and reporting requirements
2.024	California's current water infrastructure and supply is dominated by energy-intensive inter-basin transfers where, at great environmental and economic cost, surface waters from Northern California, Owens Valley, and the Colorado River are diverted and typically pumped long distances and over mountain ranges to meet water demands for agriculture and large metropolitan populations in arid and semiarid regions of California. Climate change forecasts create additional concerns regarding the region's water security as rising temperatures have already caused snowpack in the Sierras to melt earlier and at faster rates, leaving less water available for capture and transport in the late summer and fall months.	Comment noted. No change is requested.	12. General Comment
2.025	The combination of an unpredictable climate, a limited, scarce resource, and a growing public demand creates an undeniable need to conserve water to the fullest extent possible and put all water resources to reasonable and beneficial uses, as reflected in the requirements of the California Constitution and the California Water Code. However, despite these clear legal mandates, the considerable environmental and economic costs of maintaining the State's water infrastructure, and the looming threats posed by a changing climate, water resources are generally transported over great distances, utilized once, and then dumped into our rivers, creeks, and the Pacific Ocean.	Comment noted. No change is requested. See responses to Comments 1.002 and 2.006 for related discussion of this topic.	12. General Comment

No.	Comment	Response	Categories
2.026	California law reflects the scarcity and value of water resources. For nearly a century, a self-executing provision of the California Constitution has required that all water resources of the State be put to reasonable and beneficial use to the maximum extent possible and has prohibited *any* waste and unreasonable use of a water resource. (Cal. Const., article X, § 2.) Thus, the State Board and the nine Regional Boards must ensure uses are both beneficial and reasonable and prevent waste and unreasonable use when regulating all water resources in California. This is codified in Article X, section 2 of the Constitution which requires that uses be reasonable and beneficial while also prohibiting the waste and unreasonable use of all water resources of the State. Article X, section 2 reads in pertinent part as follows: It is hereby declared that because of the conditions prevailing in this State the general welfare requires that the water resources of the State be put to beneficial use to the fullest extent of which they are capable, and that the waste and unreasonable use or unreasonable method of use of water be prevented, and that the conservation of such waters is to be exercised with a view to the reasonable and beneficial use thereof in the interest of the people and for the public welfare.	Comment noted. See responses to Comments 2.006 and 2.028.	12. General Comment

No.	Comment	Response	Categories
2.027	Recycled water is defined as "water which, as a result of treatment of waste, is suitable for a direct beneficial use or a controlled use that would not otherwise occur and is therefore considered a valuable resource." The State Board's Recycled Water Policy developed pursuant to California Water Code section 13140 also provides that the reuse of wastewater in California is meant to supplement and/or substitute for the use of surface or groundwater. Accordingly, the Recycled Water Policy highlights and applies the mandates already contained in Article X, section 2 of the California Constitution and Water Code section 100 that the use and management of wastewater, like all water in the State, must be reasonable and not wasteful.	See responses to Comments 2.006 and 2.028.	13. Comment out of scope
2.028	Article X, section 2 and Water Code section 100 impose an affirmative, non-discretionary duty on the State Board to ensure the reasonable and beneficial use of water resources and to prevent the waste and unreasonable use of all water resources of the State. California Water Code section 275 explicitly requires that the State Board take all necessary action in executive, legislative, and judicial forums to prevent unreasonable use of water. "Section 275 directs that the [State Board] and DWR take appropriate action to prevent waste and the unreasonable use of water." The State Board also states in the Recycled Water Policy that the policy "fully implements state . . . water quality laws and regulations . . . and put the waters of the state to the fullest use of which they are capable."	See response to Comment 2.006.	13. Comment out of scope

No.	Comment	Response	Categories
2.029	*The State Water Board should mange recycled water in an integrated manner and expressly require Regional Boards to consider the reasonable and beneficial use of reusing wastewater.* As detailed above, Article X, section 2 of the Constitution mandates that all water resources in California are used both for beneficial uses and reasonably. And, as also explained above, Water Code section 275 provides that the State Water Board take all appropriate executive, legislative, and judicial actions to prevent the waste and unreasonable use of water.	See response to Comment 2.006.	12. General Comment
2.030	One purpose of the Recycled Water Policy is to "provide direction to the Regional Water Quality Control Boards (Regional Water Boards), proponents of recycled water projects, and the public regarding the appropriate criteria to be used by the State Water Board and the Regional Water Boards in issuing permits for recycled water projects." Given this purpose and the requirement that recycled water be used both beneficially and reasonably, the update to the Recycled Water Policy provides the State Board an opportunity to execute its duties imposed by Article X, section 2 and provide that "water recycling requirements" permits must ensure that the permitted use is both reasonable and beneficial.	See response to Comment 2.006.	12. General Comment
2.031	Once available, California's water resources must be managed in an integrated way if California is to solve its water challenges—which are certain to become increasingly difficult given the State's growing population and extended droughts. Without ensuring that recycled water is used reasonably and not wastefully the State Board risks substantial, and likely irreversible, commitments of water to unsustainable uses in the face of the state's worsening water	See response to Comment 2.006.	2. Benefits of recycled water

No.	Comment	Response	Categories
	imbalance. Such unsustainable commitments of recycled water already exist, including irrigation of water intensive crops in over-allocated, over-drafted basins. Further, merely adding recycled water to existing supplies without integration and rationalization of uses via a reasonable use analysis will do nothing to restore overdrawn and impaired waters and will only further foster urban sprawl. Yet, the Recycled Water Policy is meant to combat California's "unprecedented water crisis" by "mov[ing California] towards sustainable management of surface waters and groundwater…." Failing to require that all recycled water is used reasonably and not wastefully would completely undermine this purpose and the State Water Board's laudable goals of encouraging the development and use of recycled water. Therefore, the State Water Board should revise the Recycled Water Policy to expressly state that all recycled water in California must be used for beneficial uses and must be used reasonably and not wastefully, and that the reasonable beneficial requirement shall be incorporated into all permits governing recycled water. 1.5 d. It is the State Water Board's intent to promote consistency in the permitting of recycled water projects in California while also preserving sufficient authority and flexibility for the regional water boards to address site-specific conditions. All recycled water in California must be used for beneficial uses and must be used reasonably and not wastefully, and that the reasonable beneficial requirement shall be incorporated into all permits governing recycled water.		
2.032	*Oppositions' fears that a statewide goal to eliminate ocean wastewater discharges will become an enforceable mandate is unfounded.*	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
2.033	CCKA does not support an enforceable statewide mandate that California eliminate all its ocean wastewater discharges. In 2015 Senator Hertzberg introduced Senate Bill 163, requiring 50 percent of wastewater effluent to be reused by 2026 and 100 percent reused by 2036. CCKA did not support this legislation. We believed the bill would force communities to pursue non-potable reuse and bind them to purple pipe infrastructure for wasteful uses such as golf courses or non-native landscaping. CCKA did, and still does, not want to see a statewide mandate to recycle all ocean wastewater discharges because it will force the construction of unnecessary purple-pipe projects.	This Comment is linked to Comment 2.034.	3. Goals, mandates, and reporting requirements
2.034	There are several important differences between Senate Bill 163 and the State Water Board setting a statewide goal to eliminate ocean discharges and instead recycled that water and put it to a beneficial use. First, CCKA is not asking for an enforceable mandate. We are only requesting an ambitious goal, tied to a tangible outcome, that will encourage communities to pursue water recycling. Second, California has enacted Assembly Bill 574, which provides the necessary “bridge” for the water recycling community to achieve zero ocean wastewater discharges without forcing unnecessary purple pipe infrastructure. Lastly, CCKA is not proposing this goal be achieved by a date certain. We are only advocating for California to make a policy goal that we should be striving to eliminate the wasted discharge to the ocean of treated wastewater by recycling it and reusing it as a valued and much needed resource to our water supply portfolio.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
2.035	Contrary to the oppositions' arguments, a statewide goal to eliminate ocean wastewater discharges is appropriate and does not needlessly focus only on the coast. A goal to eliminate ocean wastewater discharges benefits the entire state and expanding the goal to eliminate discharges into inland waterways will have unintended consequences. Southern California and the Bay Area discharge the state's majority of treated ocean wastewater, while concurrently importing most of the state's water. Reusing treated ocean wastewater discharges and reusing it for local water supplies will help California reduce its statewide reliance on imported water and make Southern California and the Bay Area more resilient and self-sufficient. Reusing ocean wastewater discharges not only helps our urban coastal communities face an uncertain climate change future but helps inland communities whose water is currently being diverted.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
2.036	Furthermore, including inland waterways into a goal to eliminate treated wastewater discharges would have dramatic unintended consequences. Many inland waterways depend on treated effluent. Requiring upstream treatment facilities to recycle all their wastewater would impact the legal rights of downstream water rights holders. CCKA is advocating for the elimination of ocean wastewater discharges because it is a waste to not recycle that treated resource. The same is not true for inland waterways.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
2.037	CCKA does not want to set a statewide mandate to recycle all treated ocean wastewater discharges. We do not want to require the state to eliminate all ocean wastewater discharges by a date certain. But if we did, and unlike Senate Bill 163, California now has a bridge (AB 574) to recycle all its ocean wastewater discharges and not force unnecessary purple pipe projects.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
2.038	Recycling all ocean wastewater discharges helps the entire state as urban coastal communities become water self-sufficient and pressure is taken off inland communities whose water is currently being diverted.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
2.039	Requiring inland wastewater discharges be eliminated is a dangerous concept as it would impact downstream uses and water rights.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
2.040	A policy goal of eliminating ocean wastewater discharges prevents waste and helps California become more resilient to the impacts climate change will have on our water supplies.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
2.041	*The State Water Board should not only minimize treated ocean wastewater discharges – it should set a statewide goal of eliminating treated ocean wastewater discharges.* It is not enough to only minimize treated ocean discharges – California should be striving to eliminate them while putting that treated water to a beneficial use as municipal water supply.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
2.042	California's current water recycling goals and mandates of one million acre-feet per year (af/y) by 2020 and two million af/y by 2030 are arbitrary and based on volumes that may be either underwhelming or impossible to attain.	Section 3.2.1 and 3.2.2 of the Staff Report with SED describe the origins of the recycled water goals and mandates in the Policy as building on data and goals available at the time the Policy was adopted in 2009. The State Water Board will implement the recycled water reporting requirements in section 3.2 of the Amendment, to gather statewide data on the potential for recycled water use in the State. Once data are generated from this statewide reporting system, the statewide goals may be updated through a future Policy amendment. Additionally, the State Water Board has funded 183,340 afy of recycled water through Proposition 1 and Clean Water State Revolving Fund 1% loans since 2014, which may assist in meeting these goals.	12. General Comment
2.043	California needs a water recycling goal that is ambitious, yet attainable, and tied to a tangible outcome worth achieving. Local agencies have already made commitments to this end. For example, the Orange County Sanitation District has set a goal of recycling 100 percent of their wastewater flows.	See response to Comment 2.042.	3. Goals, mandates, and reporting requirements
2.044	Achieving zero ocean wastewater discharges would also serve to eliminate pollution to the ocean that exacerbate harmful algal blooms and ocean acidification hot spots.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
2.045	Rather than reselect an arbitrary recycled water goal during the Revised Recycled Water Policy, the State Water Board should <u>set a water recycling goal of eliminating ocean wastewater discharges.</u>	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
2.046	<u>The current statewide mandate should not be removed unless it is replaced with an ambitious goal tied to an outcome worth achieving.</u>	See response to Comment 2.042 and section 4.5.1.1 of the Staff Report with SED. The State Water Board strongly supports the use of recycled water in California, and mandates may be a tool in the future to promote recycled water in the state. Once tracking recycled water use	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
		improves and there is a better understanding of how much wastewater is available and feasible to recycle, mandates could be implemented and made enforceable through a future Policy amendment. However, at this time, the goals for recycled water use serve a similar function of providing direction and aspiration to increase recycled water use without the ambiguity of mandating recycled water use in a manner that is not enforceable. Furthermore, at this time, other tools are more appropriate to advance the use of recycled water statewide, such as creating a framework for streamlined permitting of recycled water projects, supporting recycled water research, establishing policies and regulations, and partnering with the recycled water industry in expanding public outreach and education efforts.	
2.047	The State Water Board should make the following revisions to the Policy: 3.1. Goals. To encourage the increased use of recycled water in California, and to prevent the waste and unreasonable use of treated water in accordance with Water Code section 275, the State Water Board adopts the following goals: 3.1.2. Eliminate ~~Minimize~~ the direct discharge of treated municipal wastewater to enclosed bays, estuaries and coastal lagoons, and ocean waters, except where necessary to maintain beneficial uses. For the purpose of this goal, treated municipal wastewater does not include brine discharges from recycled water facilities or desalination facilities.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
2.048	Minimizing ocean wastewater discharges is an inconsequential goal. Even if we did not recycle one additional gallon of water, ocean wastewater discharges would be minimized through increasing water efficiency measures and conservation.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
2.049	We need a goal that acknowledges ocean wastewater discharges is a waste, and one that encourages all ocean discharges to be treated and reused. CCKA's proposed goal is a reasonable policy goal that California should be striving towards. It is not an enforceable mandate. It does not need to be achieved by a date certain. It provides for the continued discharge of brine. It accounts for the need to continue to meet water quality standards and protect beneficial uses. This goal is only a policy statement that treated wastewater is a valued resource that should not be wastefully discharged to the ocean, but instead, reused as part of a larger strategy for California to become regionally water self-sufficient and climate resilient.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
2.050	THE STATE WATER BOARD SHOULD REQUIRE A LEGALLY SUFFICIENT ANTIDEGRADATION ANALYSIS FOR ALL RECYCLED WATER PROJECTS.	This comment is linked to Comment 2.051. See response to Comment 2.051.	7. Permitting for Non-potable
2.051	The State Water Board continues to allow for flawed antidegradation analyses in the Recycled Water Policy Amendment. Antidegradation law requires that, in high-quality waters, baseline water quality must be maintained unless it is demonstrated that any change in quality will (1) be consistent with the maximum benefit to the people of the state ("maximum benefit"); (2) not unreasonably affect present or probable future beneficial uses; and (3) not result in water quality less than that prescribed by state policies. Furthermore, any activity that produces or may produce waste, and that discharges into high-quality waters, must result in best practicable treatment control ("BPTC") to ensure that (a) pollution or nuisance will not occur, and (b) the highest water quality consistent with maximum benefit will be maintained.	Section 7.3.2 of the May 9, 2018 draft Amendment, addressing streamlined permitting for non-potable recycled water projects, was removed in response to this comment, meaning that non-potable recycled water projects must either enroll under a statewide order for non-potable recycled water use, or be permitted through a site-specific permit. Either permitting mechanism would require compliance with the Antidegradation Policy. In addition, section 8.2.2 of the Amendment was revised in response to this comment to clarify that, for groundwater recharge projects in a basin where a basin plan amendment based on an accepted SNMP has been adopted, the antidegradation analysis may be based on the technical findings of the basin plan amendment. To the extent there is any remaining conflict between the Amendment and the Antidegradation Policy, the amended Policy, as the later	7. Permitting for Non-potable

No.	Comment	Response	Categories
	The Recycled Water Policy Amendment fails to meet the requirements of Antidegradation Policy by failing to (1) establish a water-quality baseline to determine authorized alterations in water quality and their impacts on beneficial uses, (2) conduct an adequate maximum-benefit analysis, and (3) establish BPTC to ensure that nuisance and pollution will not occur and that the highest water quality consistent with maximum benefit will be maintained. By merely stating that the Antidegradation Policy has been satisfied, the Water Board fails to make the required findings that would allow high quality waters to be degraded by recycled water projects.	adopted and more specific policy, will govern. The Amendment will be adopted pursuant to Water Code section 13142 and Government Code section 11353 as a policy for water quality control. Such policies may describe water quality principles and guidelines for the control and use of recycled water (Gov. Code sec. 13142). The Amendment includes regulatory provisions. A "regulation" is defined as " every rule, regulation, order, or standard of general application or the amendment, supplement, or revision of any rule, regulation, order, or standard adopted by any state agency to implement, interpret, or make specific the law enforced or administered by it, or to govern its procedure." (Gov. Code sec. 11342.600). The proposed amendments related to antidegradation will interpret or make specific how the Antidegradation Policy is to be interpreted or made specific in the context of recycled water. Consequently, when the Amendment describes what is necessary to satisfy the requirements of the Antidegradation Policy for a type or class of recycled water projects, then that description will supersede the Antidegradation Policy to the extent of any conflict. In addition, the requirements of an SNMP, as specified in the Amendment, are consistent with the Antidegradation Policy. SNMPs must include: (1) a monitoring plan to determine whether concentrations of salts and nutrients are consistent with applicable water quality objectives, (2) source identification of salt and nutrients, (3) implementation measures to manage or reduce the salt and nutrient loading in the basin on a sustainable basis, and (4) an antidegradation analysis demonstrating that the existing projects, reasonably foreseeable future projects, and other sources of loading to the basin included within the plan will, cumulatively, satisfy the requirements of the Antidegradation Policy, which would include an analysis of	

No.	Comment	Response	Categories
		baseline water quality, best practicable treatment or control needed to prevent pollution or nuisance, and maximum benefit to the people of the state.	
2.052	The Recycled Water Policy Amendment fails to meet the requirements of the Antidegradation Policy because there is no establishment of a water quality baseline to determine authorized alterations in water quality and their impacts on beneficial uses. The State Water Board acknowledges in Amendment Section 7.1.1. that "[i]rrigation and other non-potable uses of with recycled water in accordance with this Policy is to the benefit of the people of the State of California. Nonetheless, the State Water Board finds that the use of water for irrigation may, regardless of its source, collectively affect groundwater quality over time." When there "is a determination that the receiving water is high quality and that an activity will discharge waste into the receiving water" degradation is assumed and an Antidegradation Policy analysis is required. Therefore to allow degradation, the Recycled Water Policy Amendment – or the plans and permits the Amendment relies upon – must "set forth findings that bridge the analytical gap between the raw evidence and ultimate decision." The State Board's findings must provide "the analytic route [it] traveled from evidence to action" to satisfy this requirement, so as to allow the reviewing court to satisfy its duty to "compare the evidence and ultimate decision to 'the findings.'" Mere recitation of legal requirements – as done here - is not sufficient.	See response to Comment 2.051.	7. Permitting for Non-potable

No.	Comment	Response	Categories
2.053	The Recycled Water Policy Amendment fails to meet the requirements of the Antidegradation Policy because it allows for an inadequate maximum-benefit analysis. An adequate maximum-benefit analysis compares the economic, health, and environmental costs and benefits of the authorized degradation. The State Water Board laid out how a proper maximum-benefit analysis should be conducted in State Water Board Order 86-17. A maximum-benefit determination "is made on a case-by-case basis and is based on considerations of reasonableness under the circumstances at the site" and must consider the following factors: "past, present, and probable beneficial uses of the water" as specified in the Water Quality Control Plans; "economic and social costs, tangible and intangible, of the proposed discharge compared to the benefits, environmental aspects of the proposed discharge; and the implementation of feasible alternative treatment or control methods." The Recycled Water Policy Amendment did not conduct this required analysis and it allows all recycled water projects that meet the and therefore does not comply with the law and is an abuse of discretion.	See response to Comment 2.051.	7. Permitting for Non-potable
2.054	The Amendment fails to meet the requirements of the Antidegradation Policy because it does not require Best Practicable Treatment or Control. The Amendment does not require Best Practicable Treatment or Control (BPTC).	See response to Comment 2.051.	7. Permitting for Non-potable
2.055	It is impossible to determine whether authorized discharge activities will ensure maintenance of the highest quality water consistent with maximum benefit, since (1) the amount of authorized degradation is unknown, (2) the maximum-benefit analysis is insufficient, and (3) there are no enforceable standards.	See response to Comment 2.051.	7. Permitting for Non-potable

No.	Comment	Response	Categories
2.056	The State Water Board fails to adhere to the Antidegradation Policy by allowing non-potable recycled water projects to merely be consistent with a Salt and Nutrient Management Plan or the statewide General Reclamation Orders. Antidegradation analyses should be done on a case by case basis to adhere to the Antidegradation Policy. Allowing a specific water recycling project to dodge an antidegradation analysis simply because it complies with a Salt and Nutrient Management Plan or the statewide General Reclamation Orders is illegal. Even assuming it was legally sufficient to not conduct a project-specific antidegradation analysis by complying with a Plan or General Order, the Amendment still fails because neither the Salt and Nutrient Management Plans nor the General Reclamation Orders have conducted their own proper antidegradation analysis. The State Water Board cannot allow recycled water projects to comply with the Antidegradation Policy by following plans and orders that themselves have legally flawed antidegradation analyses.	See response to Comment 2.051.	7. Permitting for Non-potable
2.057	The Recycled Water Policy Amendment follows the same circular logic disallowed in the *Agua* and *Coastkeeper* I decisions. In *Agua*, the court held that "the order's findings that it was consistent with the maximum benefit to the people of the state, would not unreasonably affect beneficial uses, and would not violate water quality objectives, were all based on the assertion that the Order would not further degrade groundwater because the order said so, a finding the court had already determined was "circular" not supported by the evidence in the record." The court went on to state that since there "will be some discharge of waste to groundwater, the Regional Board's decree that the Order does not permit further degradation of groundwater is meaningless without an effective method to determine whether the discharge	In the Agua and Coastkeeper I cases, the regional water boards were required to demonstrate compliance with the Antidegradation Policy because Water Code section 13146 requires any state office, department, or board to comply with state policy for water quality control when carrying out activities which affect water quality. As described in response to Comment 2.051, Section 7.3 of the May 9, 2018 draft Amendment, addressing streamlined permitting, was removed in response to this comment. Section 8.2.2 of the Amendment, addressing antidegradation analysis for groundwater recharge projects, was revised in response to this comment. To the extent there is any remaining conflict between the Amendment and the Antidegradation Policy, the amended Policy, as the later adopted and more specific policy, will govern.	7. Permitting for Non-potable

No.	Comment	Response	Categories
	has resulted in a degradation of groundwater quality." In *Coastkeeper* I, the judge had the same concern because it was "unable to decide whether the Waiver violates the Antidegradation Policy because the Board has failed to apply the Policy in the manner directed by the Court in AGUA, including any consideration of whether the waters are "high quality" waters." The Recycled Water Policy Amendment continues the Water Boards' circular logic that compliance with a plan or order is sufficient to comply with the Antidegradation Policy.		
2.058	The Recycled Water Policy Amendment should require that each recycled water project conduct a site-specific analysis to determine whether the baseline water quality is being maintained, and if not, the permittee must demonstrate that any change in quality will (1) be consistent with the maximum benefit to the people of the state ("maximum benefit"); (2) not unreasonably affect present or probable future beneficial uses; and (3) not result in water quality less than that prescribed by state policies. Furthermore, any activity that produces or may produce waste, and that discharges into high-quality waters, must result in BPTC.	See response to Comment 2.051.	7. Permitting for Non-potable
2.059	The antidegradation provisions in the Amendment ignore case law and are inconsistent with the Antidegradation Policy.	See responses to Comments 2.051 and 2.057.	7. Permitting for Non-potable

No.	Comment	Response	Categories
2.060	All provisions allowing a recycled water project to evade a site-specific antidegradation analysis so long as they are consistent with a Salt and Nutrient Management Plan or a General Reclamation Order should be removed from the Amendment. The Amendment should require that each recycled water project should conduct a site-specific antidegradation analysis. However, if the State Water Board is unwilling to require site-specific antidegradation analyses, then in the alternative, the State Water Board should revise the Amendment as follows to ensure Salt and Nutrient Management Plans and/or General Reclamation Orders have legally sufficient antidegradation analyses in place before recycled water projects can rely upon them to comply with the Antidegradation Policy.	See response to Comment 2.051.	7. Permitting for Non-potable
2.061	An antidegradation analysis demonstrating that the existing projects, reasonably foreseeable future projects, and other sources of loading to the basin included within the plan will, cumulatively collectively, satisfy the requirements of State Water Board Resolution No. 68-16, Statement of Policy with Respect to Maintaining High Quality of Waters in California (Antidegradation Policy). To satisfy State Water Board Resolution No. 68-16, a plan must determine whether existing projects, reasonably foreseeable future projects and other sources will degrade high quality water. If a project will degrade high quality water, the discharge may be allowed if any change in water quality (1) will be consistent with maximum benefit to the people of the State, (2) will not unreasonably affect present and anticipated beneficial use of such water, and (3) will not result in water quality less than that prescribed in state policies. Activities that result in discharges to such high quality waters are required to use the best practicable treatment or control of the discharge necessary to	See responses to Comments 2.051 and 12.025.	7. Permitting for Non-potable

No.	Comment	Response	Categories
	avoid a pollution or nuisance and to maintain the highest water quality consistent with the maximum benefit to the people of the State.		
2.062	7.1.2. For non-potable recycled water project proponents within a basin for which the regional water board has adopted a basin plan amendment based on an accepted salt and nutrient management plan pursuant to 6.2.3.3, and meeting the antidegradation analysis detailed in 6.2.4.5, compliance with the Antidegradation Policy may consist of an analysis demonstrating that the project is consistent with the adopted basin plan amendment. For non-potable recycled water project proponents within a basin with an accepted salt and nutrient management plan that comports with the antidegradation analysis detailed in 6.2.4.5, but without an associated basin plan amendment, the antidegradation analysis may be based, in part, on the technical findings of the accepted salt and nutrient management plan as described in 6.2.2. For non-potable recycled water project proponents within a basin where a salt and nutrient management plan has not been accepted by the regional water board, compliance with the Antidegradation Policy will require a site-specific antidegradation analysis that determines whether the discharge will degrade high quality water. If a project will degrade high quality water, the discharge may be allowed if any change in water quality (1) will be consistent with maximum benefit to the people of the State, (2) will not unreasonably affect present and anticipated beneficial use of such water, and (3) will not result in water quality less than that prescribed in state policies. Activities that result in discharges to such high quality waters are required to use the best practicable treatment or control of the discharge necessary to avoid a pollution or nuisance	See response to Comment 2.051.	7. Permitting for Non-potable

No.	Comment	Response	Categories
	and to maintain the highest water quality consistent with the maximum benefit to the people of the State. ~~depend on the permitting mechanism selected by the regional water board as described in 7.2. and 7.3 below. If the proposed project is in a basin identified pursuant to 6 as needing a salt and nutrient management plan and if directed by a regional water board pursuant to Water Code section 13267, the recycled water project proponent may be required to develop or participate in developing a salt and nutrient management plan.~~		
2.063	~~7.2.2. Recycled water project proponents seeking to enroll under statewide water reclamation requirements can demonstrate compliance with the Antidegradation Policy by demonstrating that the project complies with the conditions of the order.~~	See response to Comment 2.051.	7. Permitting for Non-potable
2.064	8.2.2. For groundwater recharge projects within a basin for which the regional water board has adopted a basin plan amendment based on an accepted salt and nutrient management plan pursuant to 6.2.3.3, and meeting the requirements detailed in 6.2.4.5., compliance with the Antidegradation Policy may consist of conducting an analysis demonstrating that the project is consistent with the adopted basin plan amendment. 8.2.3. For groundwater recharge projects within a basin with a salt and nutrient management plan accepted by the regional water board pursuant to 6.2.3.2 (i.e., without an associated basin plan amendment), and meeting the requirements detailed in 6.2.4.5., the antidegradation analysis may be based, in part, on the technical findings of the accepted salt and nutrient management plan as described in 6.2.2.	See response to Comment 2.051. Section 8.2.2 of the Amendment was revised in response to this comment to provide that consistency with the basin plan amendment, in and of itself, is insufficient to satisfy the Antidegradation Policy but that the antidegradation analysis may be based, in part, on the technical findings of the basin plan amendment. The addition of text referring to section 6.2.4.5 of the Amendment was not accepted because the requirements of section 6.2.4.5 would have to be met in order for a regional water board to accept a SNMP, so it does not need to be restated.	8. Permitting for GWR

No.	Comment	Response	Categories
	8.2.4. For a groundwater recharge project within a basin where a salt and nutrient management plan has not been accepted by the regional water board, compliance with the Antidegradation Policy will require a site- specific antidegradation analysis that determines whether the discharge will degrade high quality water. If a project will degrade high quality water, the discharge may be allowed if any change in water quality (1) will be consistent with maximum benefit to the people of the State, (2) will not unreasonably affect present and anticipated beneficial use of such water, and (3) will not result in water quality less than that prescribed in state policies. Activities that result in discharges to such high quality waters are required to use the best practicable treatment or control of the discharge necessary to avoid a pollution or nuisance and to maintain the highest water quality consistent with the maximum benefit to the people of the State. ~~If a groundwater recharge project proponent is actively participating in the development of a salt and nutrient management plan for the basin or subbasin to the satisfaction of the applicable regional water board, then compliance with the Antidegradation Policy may be demonstrated as follows:~~		
2.065	THE STATE WATER BOARD SHOULD PROTECT THE PUBLIC AND AQUATIC HEALTH FROM CONSTITUENTS OF EMERGING CONCERN.	The sub-components of this comment are addressed in subsequent responses below.	10. CECs and Attachment A
2.066	The State Water Board should continue to support the use of bioassays as a method of detecting new constituents of emerging concern to be monitored.	See response to Comment 2.009	10. CECs and Attachment A

No.	Comment	Response	Categories
2.067	There are over 30 million chemicals registered on the CAS Registry, with over 4,000 chemicals added daily. Over those millions of chemicals, the Expert Panel only considered 489 constituents of emerging concern (CECs), and decided that only 3 CECs should be used for health-based monitoring. Given that thousands of chemicals are potentially present in recycled water and that information about those chemicals is rapidly evolving, the Panel recommended that the State Water Board continue to rely on a transparent, science-based framework to guide prioritization of which CECs should be included in recycled water monitoring programs both now and in the future as additional data become available.	One of the primary challenges with CECs is the lack of available monitoring data or health-based thresholds of significance. The Panel considered the 489 constituents for which there was data available to apply to the risk-based framework in Figure ES.1. of the 2018 report *Monitoring Strategies for Constituents of Emerging Concern (CECs) in Recycled Water* after conducting a literature and data search from state-wide, national, and international sources. While other constituents may be present in the water, the limited data availability did constrain the Panel's ability to evaluate constituents that may be present, but we are not monitoring for. This is in part why the use of bioanalytical screening tools is important because ER-α and AhR are able to screen for any constituent that activates the respective receptors. Furthermore, the Panel encouraged (1) additional short-duration monitoring of a broader scan of targeted CEC to increase the amount of available monitoring data, and (2) additional research on health-based levels of significance, to improve their ability to expand their assessment of CECs. Section 10.1.3 of the Amendment emphasizes the need for additional CEC research to help fill the data gaps. The Panel will re-assess the state of the science and available data each time they are reconvened, and update their recommendations based on the current state of the science.	10. CECs and Attachment A
2.068	As originally expressed during the 2010 Expert Panel, CCKA remains concerned that the CEC Monitoring Program is not sufficient to identify and add new CECs. We agree that the Panel's risk-based framework is effective in identifying CECs for which pertinent data are available. But more importantly, we agree with the Expert Panel that "the framework cannot capture all possible new compounds that may	See responses to Comments 2.009, 2.010, and 2.076.	10. CECs and Attachment A

No.	Comment	Response	Categories
	be entering the market, nor does it adequately address their transformation products." To help identify such compounds that may occur in recycled water and their potential, if any, to affect human health, we strongly support the Panel's belief "that bioanalytical screening methods are a critically important tool."		
2.069	The State Water Board should continue to support the Panel's recommendation "that the Estrogen Receptor alpha (ER-α) and the Aryl hydrocarbon Receptor (AhR) bioassays be used to respectively assess estrogenic and dioxin-like biological activities in recycled water." These assays are now sufficiently standardized and robust for screening level data collection and assessment. These two in vitro bioassays were selected because each have clear adverse outcome pathways that allow specific molecular responses to be adequately standardized for screening recycled water quality at potable reuse projects.	See response to Comment 2.009.	10. CECs and Attachment A
2.070	Additionally, we strongly support the Panel's recommendation that the "investment in research and training is needed to provide an expanded, robust "bioscreening toolbox", and to increase capacity for bioanalytical measurement." The State Water Board should <u>maintain the incorporation of the bioanalytical screening methods into its CEC Monitoring Program and invest in research to expand a bioscreening toolbox.</u>	See response to Comment 2.009.	10. CECs and Attachment A
2.071	*The State Water Board should reconvene the CEC Expert Panel every three years.* Given the quickly evolving nature of CECs, the State Water Board should require the Expert Panel be reconvened every three years. The Panel recommends that the State Water Board reconvene an	See response to Comment 2.010.	10. CECs and Attachment A

No.	Comment	Response	Categories
	independent Panel to review proposed changes to CEC monitoring recommendations every three years.		
2.072	Due to the uncertainty that is inherently associated with the universe of chemicals that might occur in recycled water now and in the future, the need to establish a formal CEC monitoring and assessment program for recycled water that is responsive to rapidly changing CEC issues is critical.	See response to Comment 2.010.	10. CECs and Attachment A
2.073	A five-year Expert Panel reconvening is unacceptable. Convening a Panel every five years could result in errors and missing data. Applying the risk-based framework recommended by the 2010 Panel requires structure and consistent protocols yet no formal update of the selected CECs occurred until 2018. Reliance on health and performance-based indicators provides assurance of proper operation but is not suitable to account for new CECs. A three-year Expert Panel cycle will lead to more up-to-date on and off ramps. We request the State Water Board reconvene the Expert Panel every three years.	See response to Comment 2.010.	10. CECs and Attachment A
2.074	A more flexible and responsive program should be developed to update CEC monitoring recommendations in response to rapidly emerging science, technology advances and monitoring (screening) data collected. In this context, the State Water Board should take a more active role in procuring, managing and accessing CEC monitoring data and associated toxicological thresholds. The State Water Board needs a more responsive program to adjust to new information. The State Water Board should streamline implementation of Panel recommendations and make data widely available in easy to use format. We support the Panel recommends that the State Water Board consider taking several procedural steps to clarify roles and	See response to Comment 2.010 regarding creating a flexible and responsive CEC Monitoring Program and addressing the Panel's recommendations for programmatic changes. Section 1.3 of Attachment A of the Amendment includes a provision that requires electronic reporting of CEC monitoring results in a database identified by the State Water Board. Data submitted to the State Water Board's data is publicly available, but the electronic reporting will improve data accessibility.	10. CECs and Attachment A

No.	Comment	Response	Categories
	responsibilities for the State and Regional Water Boards (as described in Section 2.3) for permitting of potable water reuse projects, to improve the management of potable water facility monitoring data (i.e., CEC, bioanalytical, and high-frequency operation data), and the reporting of potable water operations to the public. The State Water Board should incorporate the Expert Panel's procedural recommendations on creating a flexible and responsive CEC Monitoring Program: developing a data management system for potable water facility monitoring data; using high-frequency operational monitoring data; developing consistent permittee electronic reporting requirements; and developing a protocol for providing the public an annual report summarizing performance of potable reuse projects.		
2.075	10.2.1. (1) The State Water Board, in consultation with CDPH, shall convened a "blue-ribbon" Science Advisory Panel every three ~~five~~ years to guide future actions relating to CECs. To streamline the Panel's analysis, the State Water Board shall develop a data management system for potable water facility monitoring data; use high-frequency operational monitoring data; develop consistent permittee electronic reporting requirements; and develop a protocol for providing the public an annual report summarizing performance of potable reuse projects.	See response to Comment 2.010.	10. CECs and Attachment A
2.076	*The State Water Board should prioritize resources towards establishing a monitoring protocol that is protective of aquatic health.* The Expert Panel should be considering impacts to aquatic health when developing an appropriate CEC Monitoring Program for California. Just like in 2010,	In April 2012, a scientific advisory panel named the "Ecosystems Panel" (Panel) provided recommendations for the monitoring of CECs in aquatic ecosystems. The recommendations are presented in a report titled, "Monitoring Strategies for Chemicals of Emerging Concern (CECs) in California's Aquatic Ecosystems." In the report,	10. CECs and Attachment A

No.	Comment	Response	Categories
	the State Water Board has once again failed to instruct the Expert Panel to assess CEC impacts to aquatic health. The Panel was "instructed to evaluate potential risks for all routes of exposure, except potential exposures associated with consumption of crops irrigated with recycled water, but to limit their deliberations to impacts on human (*and not ecological*) health." (Emphasis added.)	the Panel recommended using a risk-based screening framework to identify an initial list of CECs to monitor. The Panel also recommended implementing an adaptive phase monitoring approach to assess the presence of the CECs and their potential risk to the environment. The Panel was funded by the State Water Resources Control Board and the David and Lucile Packard Foundation. Water Board Staff has prepared a report that presents the Panel's recommendations and some of the regional water boards have been implementing the Ecosystems Panel recommendations. Additional information can be found here: https://www.waterboards.ca.gov/water_issues/programs/swamp/cec_aquatic/ In 2017, the State Water Board tasked the Science Advisory Panel for Recycled Water to focus their efforts on monitoring recommendations for CECs in recycled water, and potable reuse, which logically focused on potential impacts to human health. The evaluation of risks associated with exposure to CECs for human health vs. aquatic life are significantly different scopes of research. Similarly, evaluating CECs in recycled water vs. ambient water are different scopes of research. Consequently, the State Water Board separated these scopes of work and addressed them separately. As discussed in response to Comment 2.011, the State Water Board is working to reconvene the Science Advisory Panel for CECs in aquatic ecosystems in 2019.	

No.	Comment	Response	Categories
2.077	The discharge of CECs to California's receiving waters occurs daily due to recycled water. As recycled water becomes an increasingly important part of California's water supply portfolio, the State faces the challenge of monitoring and regulating the discharge of CECs into surface and groundwater. Many streams in Southern California are effluent-dominated streams with 80-95 percent of dry weather flows coming from recycled water discharges, and many Northern California streams receiving recycled water effluent interact regularly and closely with groundwater. As such, the importance of monitoring for CECs is critical to identify risks posed to public health and aquatic life.	See responses to Comments 2.010 and 2.076.	10. CECs and Attachment A
2.078	The Recycled Water Policy established the Expert Panel for "describing the current state of scientific knowledge regarding the risks of emerging constituents to public health and the *environment*." (Emphasis added.) The Policy further called on the Panel's Report to "recommend actions that the State of California should take to improve our understanding of emerging constituents" because "[r]egulating most CECs will require . . . more specific determinations as to how and at what level CECs impact public health or *our environment*." This mandate was directed at an expert Panel because, as the Report notes, "[t]here needs to be additional research . . . to determine *potential environmental* and public health impacts." (Emphasis added.) This research is further needed to implement the Policy's direction to agencies to "minimize the likelihood of CECs impacting human health and *the environment* by means of source control and/or pollution prevention programs." (Emphasis added.)	See response to Comment 2.067.	10. CECs and Attachment A

No.	Comment	Response	Categories
2.079	The Panel did not expressly acknowledge the fact that discharge of recycled water to receiving waters occurs daily, that many streams in southern California are effluent-dominated streams with 80-95 percent of dry weather flows coming from recycled water discharges, or that many northern California streams that may receive recycled water effluent interact regularly and closely with groundwater. As such, the importance of including monitoring recommendations for those CECs that potentially pose a risk to aquatic life and ecosystems is critical. By failing to recommend a robust monitoring program even in the short-term considering this dearth of data, the Expert Panel only delayed the increased, safe use of recycled water that California needs to ensure a sustainable water future.	See response to Comment 2.067.	10. CECs and Attachment A
2.080	We disagree with the Expert Panel's focus on monitoring solely for assessing human health impacts. This approach is contrary to the Recycled Water Policy's clear direction to include ecological assessments, as well as the Policy's goal of using recycled water more frequently than under the current environmental conditions examined by the Panel. The State Water Board should direct future Expert Panels to develop monitoring protocols to detect CECs that impact aquatic health.	See response to Comment 2.067.	10. CECs and Attachment A
2.081	The State Water Board should prioritize resources towards establishing a monitoring protocol that is protective of aquatic health. In April 2012, a scientific advisory panel named the "Ecosystems Panel" provided recommendations for the monitoring of CECs in aquatic ecosystems. To-date however, we are unaware of these recommendations being used in any regulatory context. We are also aware that the Ocean Protection Council has resources to develop a monitoring protocol to detect CECs in marine waters. The State Water Board can complement the OPC's	See response to Comment 2.067.	10. CECs and Attachment A

No.	Comment	Response	Categories
	efforts by prioritizing resources that would develop a monitoring protocol to detect CECs in inland surface waters. The State Water Board should provide the resources necessary to complement the OPC's efforts to develop a marine and inland surface waters CEC monitoring protocol that is protective of aquatic health.		
2.082	*The State Water Board should direct future CEC Expert Panels to investigate the risk and potential health exposer of cumulative CECs at low levels.* CECs demonstrate low acute toxicity but cause significant reproductive effects at very low levels of exposure. In addition, the effects of exposure of aquatic organisms to CECs during the early stages of life may not be observed until adulthood. These chemicals may also have very specific modes of action that affect only certain types of aquatic animals (e.g., vertebrates such as fish). Therefore, the EPA has suggested that traditional chronic toxicity test endpoints specified in drinking water guidelines may not be sufficiently comprehensive, and Guidelines requirements for taxonomic coverage in toxicity testing may not be appropriate to derive aquatic life criteria for these chemicals.	See response to Comment 2.067.	10. CECs and Attachment A
2.083	We note that specific issues such as the potential for joint interactions affecting toxicity exist for many CECs that may occur in mixtures in the environment and which may also interact with environmental variables such as temperature. Such possible interactions should be considered. As more information is developed to account for the interactive effects of CECs, it is possible that water quality criteria may be revised up or down for individual CECs based upon data on joint interactions; use of such data would produce more risk-based criteria. Mixtures of CECs with comparable modes of action	See responses to Comments 2.011 and 2.012.	10. CECs and Attachment A

No.	Comment	Response	Categories
	may result in higher effective concentrations than would be expected based on the concentrations of any single compound. Therefore, research is needed to determine how aquatic life criteria for CECs can consider the fact that aquatic organisms are exposed to mixtures of chemicals with similar modes of action.		
2.084	The State Water Board should direct future panels to investigate the risk and potential health exposure to cumulative CECs at low levels.	See response to Comment 2.012.	10. CECs and Attachment A
2.085	*The State Water Board should direct future Expert Panels to provide no-regrets recommendations for addressing antibiotic resistant bacteria in non-potable reuse.* Future Expert CEC Panels should take antibiotic resistance more seriously. The 2017 CEC Panel decided that antibiotic resistant bacteria (ARB) is "still a major challenge and potentially an issue for any wastewater discharge into the environment" and as a result "[f]ocused investigations are needed to better understand the occurrence, fate and risks associated with ARB and ARGs in recycled water applications across California." However, the Expert Panel only provides the State Water Board a weak recommendation to "encourage the collection of data in reclaimed water and sites within California while keeping ARBeast of scientific advances related to methods and risk assessment." Given the serious implications of ARB, future Expert Panel needs to make stronger and more specific recommendations for the State Water Board to take a no-regrets strategy now to detect and control ARB.	See response to Comment 2.013.	10. CECs and Attachment A

No.	Comment	Response	Categories
2.086	Antibiotic resistance genes can be associated with mobile genetic elements, which in turn allow a promiscuous transfer of resistance traits from one bacterium to another. Together with the pathogens that are present in the reclaimed water, antibiotic resistant bacteria can potentially exchange mobile genetic elements to create the "perfect microbial storm". Given the significance of this issue, a deeper understanding of the occurrence of antibiotics in reclaimed water, and their potential influence on the selection of resistant microorganisms would be essential.	See response to Comment 2.013.	10. CECs and Attachment A
2.087	Effluents from wastewater treatment plants have been recognized as a significant environmental reservoir of antibiotics and antibiotic resistance genes (ARGs). Yet the Expert Panel stated that “information to date is not complete and seems to indicate that the causes for antibiotic resistance are still not well known and the current studies do not show that antibiotic resistance transmission is a consequence of water reuse practices considered in this report.” We disagree. In a 2013 study a broader range of ARGs were detected after the reclaimed water passed through the distribution systems, highlighting the importance of considering bacterial re-growth and the overall water quality at the point of use (POU). The study screened for pathogens with qPCR indicated presence of Lmip and gadAB genes, but not ecfx or gyrB. In the lab study, chlorination was observed to reduce 16S rRNA and sul2 gene copies in the wastewater effluent, while dechlorination had no apparent effect. ARGs levels did not change with time in soil slurries incubated after a single irrigation event with any of the effluents. However, when irrigated repeatedly with secondary wastewater effluent (not chlorinated or dechlorinated), elevated levels of sul1 and sul2 were observed. This study suggests that reclaimed water may be an important reservoir of ARGs, especially at the POU,	See response to Comment 2.013.	10. CECs and Attachment A

No.	Comment	Response	Categories
	and that attention should be directed toward the fate of ARGs in irrigation water and the implications for human health.		
2.088	A 2015 study aimed to assess the removal efficiency of microbial contaminants in a local wastewater treatment plant over the duration of one year, and to assess the microbial risk associated with reusing treated wastewater in agricultural irrigation. The treatment process achieved 3.5 logs removal of heterotrophic bacteria and up to 3.5 logs removal of fecal coliforms. 16S rRNA gene-based high-throughput sequencing showed that several genera associated with opportunistic pathogens (e.g. Acinetobacter, Aeromonas, Arcobacter, Legionella, Mycobacterium, Neisseria, Pseudomonas and Streptococcus) were detected at relative abundance ranging from 0.014 to 21 % of the total microbial community in the influent. Among them, Pseudomonas spp. had the highest approximated cell number in the influent but decreased to less than 30 cells/100 mL in both types of effluent. Besides the presence of antibiotic-resistant bacterial isolates, tetracycline resistance genes tetO, tetQ, tetW, tetH, tetZ were also present at an average 2.5 × 10(2), 1.6 × 10(2), 4.4 × 10(2), 1.6 × 10(1) and 5.5 × 10(3) copies per mL of chlorinated effluent. The study highlighted that potential risks associated with the reuse of treated wastewater arise not only from conventional fecal indicators or known pathogens, but also from antibiotic-resistant bacteria and genes.	See response to Comment 2.013.	10. CECs and Attachment A

No.	Comment	Response	Categories
2.089	The use of reclaimed wastewater (RWW) for the irrigation of crops may result in the continuous exposure of the agricultural environment to antibiotics, ARB and antibiotic resistance genes ARGs. In recent years, certain evidence indicate that antibiotics and resistance genes may become disseminated in agricultural soils as a result of the amendment with manure and biosolids and irrigation with RWW. Antibiotic residues and other contaminants may undergo sorption/desorption and transformation processes (both biotic and abiotic), and have the potential to affect the soil microbiota. Antibiotics found in the soil pore water (bioavailable fraction) as a result of RWW irrigation may be taken up by crop plants, bioaccumulate within plant tissues and subsequently enter the food webs; potentially resulting in detrimental public health implications. It can be also hypothesized that ARGs can spread among soil and plant-associated bacteria, a fact that may have serious human health implications.	See response to Comment 2.013.	10. CECs and Attachment A

No.	Comment	Response	Categories
2.090	The overuse of antibiotics in livestock farms is general, leading to a wide distribution of ARGs in aquatic environment adjacent to livestock farms. In a 2015 study wastewater and surface water samples were collected from 12 livestock farms (four pig farms, four cattle farms, and four chicken farms) in Jiangsu Province of China. The prevalence, abundance, and distribution of 22 ARGs were investigated, which were categorized into six groups, including nine tetracyclin resistance genes, three sulfonamides resistance genes, three quinolone resistance genes, two macrolide resistance genes, three aminoglycoside resistance genes, and two multidrug resistance genes, employing quantitative real-time PCR (qPCR). The results suggested that all of the 22 ARGs were detected in samples. Sul1, sul2, and tetM were the most abundant with the average concentration of 3.84 × 10(1) copies/16S recombinant RNA (rRNA) gene copies, 1.62 × 10(1) copies/16S rRNA gene copies, 2.33 × 10(1) copies/16S rRNA gene copies, respectively. Principle component analysis revealed that the comprehensive pollution of ARGs in northern Jiangsu was more serious. ARGs in wastewater were more abundant when compared to that in surface water. A preliminary study regarding the fate of ARGs after an aerobiotic process showed that tetA, tetC, sul1, sul2, oqxB, and qnrS were significantly increased. And, among the tetracycline resistance genes, the efflux pump genes were enriched while the ribosomal protection protein encoding genes were decreased in the aerobiotic process. The prevalence of ARGs in surface water is of concern; and more surveillance is required to determine the pollution level and pattern of ARGs.	See response to Comment 2.013.	10. CECs and Attachment A

No.	Comment	Response	Categories
2.091	ARB is also concerned in public places that are irrigated with non-potable reuse. Irrigation of urban parks with treated wastewater significantly increased the abundance and diversity of various antibiotic resistance genes. In a 2016 Australian study, a total of 40 unique ARGs were detected across all 12 park soils, with genes conferring resistance to β-lactam being the most prevalent ARG type. The total numbers and the fold changes of the detected ARGs were significantly increased by reclaimed water and marked shifts in ARG patterns were also observed in urban parks with reclaimed water compared to those without reclaimed water. The changes in ARG patterns were paralleled by a significant effect of reclaimed water on the bacterial community structure and a co-occurrence pattern of the detected ARG types. There were significant and positive correlations between the fold changes of the integrase intI1 gene and two β-lactam resistance genes (KPC and IMP-2 groups), but no significant impacts of reclaimed water on the abundances of intI1 and the transposase tnpA gene were found, indicating that reclaimed water did not improve the potential for horizontal gene transfer of soil ARGs. Taken together, the study's findings suggested that irrigation of urban parks with reclaimed water could influence the abundance, diversity, and compositions of a wide variety of soil ARGs of clinical relevance.	See response to Comment 2.013.	10. CECs and Attachment A
2.092	The abundance of ARBs in non-potable reuse is a concern for public and aquatic health. The studies cited above suggests that ARBs in non-potable reuse is a concern and needs to be addressed by the State Water Board. The State Water Board should direct future Expert Panels to make specific no-regrets recommendations for the State Water Board to implement to detect and control ARBs and ARGs in non-potable reuse.	See response to Comment 2.013.	10. CECs and Attachment A

No.	Comment	Response	Categories
2.093	THE STATE WATER BOARD SHOULD NOT EXCUSE THOSE THAT HAVE NOT COMPLETED SALT AND NUTRIENT MANAGEMENT PLANS WITHIN THE SEVEN-YEAR COMPLIANCE DEADLINE. The State Water Board should continue to require all groundwater basins to develop salt and nutrient management plans. The Recycled Water Policy states that it "is the intent of this Policy for every groundwater basin/sub-basin in California to have a consistent salt/nutrient management plan." However, the State Water Board suggests that the "proposed Recycled Water Policy amendment may require Regional Water Boards to prioritize which groundwater basins or sub-basins need salt and nutrient management plans..." This new language implies that the State Water Board intends to backslide on its requirement to require all basins to develop a salt and nutrient management plan. The State Water Board should not excuse those that ignored the State Water Board's mandate.	Section 6.1.3 of the Amendment requires regional boards to evaluate each basin and subbasin in its region and identify basins through a resolution or executive officer determination where salts and/or nutrients are a threat to water quality and therefore need salt and nutrient management planning to achieve water quality objectives in the long term. This evaluation and characterization process also will help focus and prioritize regional water board and stakeholder resources and efforts on those basins that may require an SNMP to meet water quality objectives. Section 6.1.3 of the Amendment has also been revised to require regional boards to review and update this evaluation. The Policy states the State Water Board's intent that every groundwater basin in California have a consistent SNMP. In the Policy, State Water Board encourages stakeholders to develop SNMPs but does not require it. If the comment is referring to the Clean Water Act anti-backsliding provisions, those requirements do not apply because the Policy is not subject to the Clean Water Act. SNMP development is a primarily collaborative process, as reaffirmed in State Board Resolution No. 2016-0061 (A)(2), which states that the State Water Board supports and encourages "Local water and wastewater entities, together with local salt and nutrient contributing stakeholders, to continue locally driven and controlled, collaborative processes open to all stakeholders that will result in the development of salt and nutrient management plans for groundwater basins in California, including compliance with CEQA and participation by Regional Water Board staff".	6. Salt and nutrient management plans

No.	Comment	Response	Categories
2.094	Many groundwater basins in the state contain salts and nutrients that exceed or threaten to exceed water quality objectives established in the applicable Basin Plans, and not all Basin Plans include adequate implementation procedures for achieving or ensuring compliance with the water quality objectives for salt and nutrients.	See response to Comment 2.093. This comment is nearly section 6.1.1 of the Amendment verbatim.	6. Salt and nutrient management plans
2.095	All plans were due no later than February 3, 2016. The Recycled Water Policy states that salt and nutrient management plans shall be completed and proposed to the Regional Board within five years from the date of the Recycled Water Policy (2/3/14) and *in no case* the period for the completion of a plan *shall exceed seven years* (2/3/16). To now exonerate those that are clearly not in compliance is bad public policy and devalues the State Water Board's credibility towards holding the regulated community accountable for statewide directives. Local agencies have now had nine years to complete salt and nutrient management plans. It is inappropriate to forgive those that are now over two years passed the absolute last deadline. The State Water Board should not excuse those that have not completed salt and nutrient management plans within the seven-year compliance deadline.	See response to Comment 2.093.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
2.096	Instead, the State Water Board should force plans to be completed using a "stick" approach by requiring any recycled water project proponents within a basin where a salt and nutrient management plan has not been accepted by the regional water board to conduct a site-specific antidegradation analysis [See Above Pg. 9-10, Revised Sections 7.1.2.; 7.2.2.; 8.2.2.; 8.2.3.; and 8.2.4.].	See response to Comment 2.051. It is not appropriate to place the burden for developing SNMPs entirely on recycled water project proponents given the proportionate contribution of some recycled water projects to salt and nutrient loading into groundwater basins in California (see section 4.8.4 of the Staff Report with SED). As stated in the Amendment, each potable use recycled water project is required to do a site-specific antidegradation analysis, regardless of whether there is an SNMP. The Amendment was revised such that non-potable projects also need to complete site-specific antidegradation analyses unless the project is permitted under a statewide order for non-potable recycled water use, such as Order WQ 2016-0068-DDW, or is within a basin with a basin plan amendment that was based on an accepted SNMP. Section 6.2.4.5 of the Amendment provides that an antidegradation analysis considering current and reasonably foreseeable future projects is a required component of an SNMP. For projects requesting enrollment under Order WQ 2016-0068-DDW, the regional water boards may require the permittee to prepare or participate in development of an SNMP.	6. Salt and nutrient management plans
2.097	During the June 19th State Water Board workshop on the Recycled Water Policy Amendment, staff stated that Regional Board discretion to not develop salt and nutrient management plans would only occur in special circumstances. The State Water Board cited an example of a basin that has no recycled water projects or areas where salt and nutrient loading is not a concern. The State Water Board should detail its intent to limit the exemption of developing salt and nutrient management plans and provide specific examples or guidance for the Regional Board to determine where salt and nutrient management plans are not a threat to water quality. Otherwise, Regional Boards will default to not developing them as they are resource intensive.	See response to Comment 2.093. Regional water boards are ultimately responsible for meeting water quality objectives in the basins in their regions. The Amendment includes a list of factors to consider in determining whether or not a basin or subbasin requires an SNMP. Due to California's uniquely diverse geography, groundwater basin characteristics in California range from those that have a very low population and salt and nutrient loads with high rainfall rates, to those with dense populations, relatively low rainfall, and high salt and nutrient loading. Given this diversity, State Water Board staff does not believe that it is appropriate for the State Water Board to express an intent to limit the regional water boards in their assessments of whether salts and nutrients represent a threat to water quality objectives.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
2.098	The State Water Board should be consistent when requiring Regional Boards to assess and review data. The Amendment requires Regional Boards to reassess whether a salt and nutrient management plan is necessary every 10 years. Additionally, Section 6.2.6. requires the Regional Boards to assess and review monitoring data every 5 years but no more than every 10 years. This discretion between 5 to 10 years is unwarranted and will default to monitoring data being assessed every 10 years. Furthermore, the 10 years to assess whether salt and nutrient management plans is irresponsible, as we have seen in the last decade the speed at which recycled water is developing in California. To ensure protection of our groundwater basins and to facilitate proper data management, both the evaluation for salt and nutrient management plans and assessing monitoring data should occur at the same time. The State Water Board should require Regional Boards to assess salt and nutrient management plans and evaluate monitoring data concurrently every 5 years. 6.1.3. Each regional water board shall update this evaluation at least every 5 ~~10~~ years to consider any changes in these factors that have occurred that would change the findings from the initial evaluation. 6.2.6. Data assessment. The regional water boards, in consultation with stakeholders, shall assess and review monitoring data generated from these plans ~~approximately~~ every 5 years ~~but no more than every 10 years~~.	Section 6.2.6 of the Amendment was revised in response to this comment, to reflect a maximum 5-year review period, unless an alternate timeline has been established in a basin plan amendment.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
2.099	The State Water Board should require Regional Boards to incorporate salt and nutrient management plans into Basin Plans. The Recycled Water Policy Amendment removes the requirement to incorporate salt and nutrient management plans into basin plans, and instead, leaves it up to the Regional Board's discretion. For the salt and nutrient management plans to be binding and enforceable on discharges, and to ensure an adequate antidegradation analysis, the State Water Board should continue to require Regional Board's to incorporate salt and nutrient management plans into Basin Plans. 6.2.1.5. Within one year of the receipt of a proposed salt and nutrient management plan, the Regional Water Boards shall consider for adoption revised implementation plans, consistent with Water Code section 13242, for those groundwater basins within their regions where water quality objectives for salts or nutrients are being, or are threatening to be, exceeded. The implementation plans shall be based on the salt and nutrient plans required by this Policy. ~~The regional water board may use its authority pursuant to Water Code section 13242 to adopt plans and programs of implementation for the protection of beneficial uses in basins whether or not a salt and nutrient management plan has been accepted by the regional water board pursuant to 6.2.3.2 or a basin plan amendment has been adopted by the regional water board pursuant to 6.2.3.3.~~ 6.2.2. Implementation of salt and nutrient management plans ~~may~~ require a regional water board to amend its basin plan. ~~The regional water board shall consider for adoption a basin plan amendment when implementation of a salt and nutrient management plan involves adoption and/or modification of water quality objectives, beneficial uses, or programs of~~	See response to Comment 2.017.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	~~implementation consistent with Water Code sections 13240, 13241, and 13242. In other cases where a regional water board determines a basin plan amendment is not required, the accepted salt and nutrient management plan serves as a technical document to support future regional water board decisions.~~ . LOOKS LIKE THE COMMENTER HAS CUT AND PASTE THE SECTION OF THE POLICY – I DO NOT THINK WE NEED TO INCLUDE THEM. MAY BE JUST MENTION THE COMMENT REFERENCES AND COPIES SECTIONS ….. OF THE POLICY		
2.100	The State Water Board should continue to require reporting of recycled water and the regional potential to recycle water. Currently, there is no streamlined statewide reporting program and data management system for tracking recycled water production, use or potential production. We applaud the State Water Board for proposing that the Recycled Water Policy include language requiring monthly reporting of influent, treated water produced, and treated water disposed.	The commenter is in support of section 3.2 of the Amendment, which includes statewide reporting requirements for recycled water and wastewater. Section 3.2 of the Amendment was revised to reduce the reporting frequency of the reporting requirements to annual reporting of monthly data for volume of influent, production, and discharge. This frequency of data collection and reporting is intended to minimize additional staff resources, while collecting data at a frequency that captures volumetric trends that will delineate the potential of recycled water in California in terms of treatment, use and potential, and demand. These data may also assist in tracking progress towards water conservation efforts. Commenters also suggested annual reporting of quarterly data. This level of disaggregation would not adequately delineate influent, production, and discharge trends to infer recycled water use and availability.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
2.101	The State Water Board should direct staff to develop a publicly accessible dashboard of the reported influent, the amount of recycled water, and the amount of treated wastewater discharged. The public should know how much treated wastewater is being wasted through ocean disposal. By creating a publicly accessible dashboard, we can measure regional progress towards maximizing recycled water in their community. The dashboard should provide the provide both regional and individually reported numbers for how much influent is reaching wastewater facilities, how much of that influent is being recycled, and how much of that treated wastewater is still being wastefully discharged to the ocean.	See response to Comment 1.037.	3. Goals, mandates, and reporting requirements
2.102	The State Water Board should continue to add clarification to the Amendment regarding the requirements for permittees to comply with Water Code Section 1211. Recycled water projects that propose to divert surface water discharges must file wastewater change petitions with the State Water Board in accordance with Water Code section 1211, which requires consultations with the Department of Fish and Wildlife to ensure that downstream aquatic habitat is protected when discharges to surface waters are decreased. The law has always required recycled water permittees to comply with Water Code Section 1211. Water Code section 1211 states, (a) Prior to making any change in the point of discharge, place of use, or purpose of use of treated wastewater, the owner of any wastewater treatment plant shall obtain approval of the board for that change. (b) Subdivision (a) does not apply to changes in the	The commenter supports Amendment language relating to Water Code section 1211; no change is requested.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
	discharge or use of treated wastewater that do not result in decreasing the flow in any portion of a watercourse. The requirement that recycled water permittees comply with Water Code Section 1211 is not new. The Division of Water Rights is already required to review wastewater change petitions filed by wastewater treatment plant owners for recycled water projects that have the potential to change the point of use, place of use, or purpose of use of treated wastewater, in accordance with Water Code section 1211. The Recycled Water Policy Amendment only clarifies what is already required by law. Therefore, the State Water Board should continue to incorporate the clarification that all recycled water permittees comply with Water Code Section 1211.		
2.103	California needs to overhaul its Water Recycling Policy to re-evaluate and revise its water recycling priorities and incorporate missing components of a successful Policy that both encourages water recycling while ensuring it is protective of both public and aquatic health. We look forward to working with the State Water Board and the water recycling industry to modernize California's water recycling program.	See responses to Comments 1.002 and 2.006.	12. General Comment

No.	Comment	Response	Categories
3	**Department of Fish and Wildlife** **Commenter: Richard Macedo**		
3.001	The California Department of Fish and Wildlife (CDFW) received the Draft Staff Report and Draft Substitute Environmental Document (Draft SR/SEO) for the proposed Draft Amendment to the Policy for Water Quality Control for Recycled Water (Project) from the Regional Water Quality Control Board for the Project pursuant the California Environmental Quality Act (CEQA) and the CEQA Guidelines. CDFW previously submitted comments in response to the early public consultation for the Project in a letter dated December 20, 2017.	This is the introductory statement to the comment letter, followed by Comments 3.006 to 3.009.	12. General Comment
3.002	Thank you for the opportunity to provide comments and recommendations regarding those activities involved in the Project that may affect California fish and wildlife. Likewise, we appreciate the opportunity to provide comments regarding those aspects of the Project that CDFW, by law, may be required to carry out or approve through the exercise of its own regulatory authority under the Fish and Game Code.	This is the introductory statement to the comment letter, followed by Comments 3.006 to 3.009.	4. State agency roles

No.	Comment	Response	Categories
3.003	CDFW is California's Trustee Agency for fish and wildlife resources, and holds those resources in trust by statute for all the people of the State. (Fish & G. Code, §§ 711.7, subd. (a) & 1802; Pub. Resources Code, § 21070; CEQA Guidelines§ 15386, subd. (a).) CDFW, in its trustee capacity, has jurisdiction over the conservation, protection, and management of fish, wildlife, native plants, and habitat necessary for biologically sustainable populations of those species. (Id., § 1802.) Similarly for purposes of CEQA, CDFW is charged by law to provide, as available, biological expertise during public agency environmental review efforts, focusing specifically on projects and related activities that have the potential to adversely affect fish and wildlife resources. CDFW is also submitting comments as a **Responsible Agency** under CEQA. (Pub. Resources Code, § 21069; CEQA Guidelines, § 15381.) CDFW expects that it may need to exercise regulatory authority as provided by the Fish and Game Code. As proposed, for example, the Project may be subject to CDFW's lake and streambed alteration regulatory authority. (Fish & G. Code,§ 1600 et seq.) Likewise, to the extent implementation of the Project as proposed may result in "take" as defined by State law of any species protected under the California Endangered Species Act (CESA) (Fish & G. Code, § 2050 et seq.), the project proponent may seek related take authorization as provided by the Fish and Game Code.	This is the introductory statement to the comment letter, followed by Comments 3.006 to 3.009.	4. State agency roles

No.	Comment	Response	Categories
3.004	**PROJECT DESCRIPTION SUMMARY** **Proponent:** State Water Resource Control Board **Objective**: The objective of the Project is to amend the Recycled Water Policy of 2013, which provides guidelines for the safe use of recycled water from municipal wastewater sources. Primary Project activities include amendments to (1) increase the development and use of recycled water, (2) reflect regulatory changes, (3) reflect the recommendations from the Science Advisory Panel, (4) reflect the evaluations of the salt and nutrient management plan development, and (5) clarify, streamline, and provide statewide consistency for permit requirements for recycled water. **Location**: Statewide.	This is the introductory statement to the comment letter, followed by Comments 3.006 to 3.009.	12. General Comment
3.005	CDFW offers the comments and recommendations below to assist the State Water Resource Control Board in adequately identifying and/or mitigating the Project's significant, or potentially significant, direct and indirect impacts on fish and wildlife (biological) resources. Both comments pertain to the cumulative impact sections of the Draft SR/SEO and Amendment to the Recycled Water Policy. **Section 4.7, Page 50 of the Draft SR/SED for the Draft Amendment to the Recycled Water Policy dated May 9, 2018 and Section 5.3, Page 8 of the Draft Amendment to the Recycled Water Policy dated May 9, 2018.** **Wastewater Change Petitions**	This is the introductory statement to the comment letter, followed by Comments 3.006 to 3.009.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
3.006	**COMMENT 1:** **Issue:** Cumulative impacts assessment. The Department advises the State Water Board to add and strengthen the language for considering cumulative impacts within the draft amendment to be consistent with CEQA Guidelines. Specifically, adding clarifying language that a Lead Agency "shall" consider the cumulative impacts of a project to determine whether it will have a significant effect upon the environment. CEQA Guidelines' Mandatory Findings of Significance § 15065(a)(3) indicates that a project having possible effects that are individually limited but cumulatively considerable shall be assessed when determining whether the project has a significant impact. The Department believes it is important to clarify this requirement within the CEQA process when determining the significance of a project's impact.	The consideration of cumulative impacts is already a requirement for all projects, regardless of whether a wastewater change petition is also required. The Amendment serves to clarify existing State Water Board authority under the Public Trust Doctrine to consider the cumulative impacts of multiple recycled water and water diversion projects on a watercourse. The CEQA requirements referred to by the commenter remain applicable.	5. 1211 and WW Change Petitions
3.007	**COMMENT 2:** **Issue:** The Project has potential cumulative impacts to the environment and public trust resources caused by the proposed recycled water project and related projects that may reduce stream flows. **Specific impact:** Specific loss of in-stream water resources necessary for species that are fully protected, endangered, threatened, and of special concern, and their associated habitat. **Why impact would occur:** Stream flows may be reduced substantially due to the cumulative effects of the Project and other related projects. **Evidence impact would be significant:** The Project has not fully evaluated the potentially cumulative impacts associated with the loss of wastewater discharge to plant and animal species downstream.	The Policy does not approve new projects, but rather sets regulatory requirements for projects. In particular, section 5 of the Amendment pertaining to wastewater change petitions largely seeks to clarify existing State Water Board authority. Therefore, an evaluation of project-specific impacts and associated flow requirements in the Staff Report with SED is not possible and speculative. Furthermore, the State Water Board evaluates each project requirement for a wastewater change petition on its own merits, including an evaluation of any public trust impacts. All projects must also comply with CEQA. Past projects and actions are generally part of the baseline under CEQA. The State Water Board is currently evaluating instream flow requirements under separate processes.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
	The Project states "Although impacts caused by the incremental decrease in streamflow resulting from the approval of a single wastewater change petition may be insignificant, impacts to the environment may be cumulatively considerable when viewed together with impacts from past, present, and probable future projects with the potential to decrease the streamflow. This is particularly true for streams where discharges from wastewater treatment facilities comprise the majority of streamflow for a portion of the year, such as the dry summer months." The reduction of wastewater can have an impact on sediment transport, a reduction in the wetted perimeter (which will result in the reduction in stream habitat), and the over-all function and values of the streams. A significant change in the amount of water in the stream will have a long-term significant and cumulative impact on streams, their habitats and the species that depend on them. **To minimize significant impacts:** An evaluation of the quantity of water needed for each species must be considered before reductions in wastewater are approved. CDFW recommends that the State Water Resource Control Board provide guidance to local wastewater treatment facilities with a specific minimum in-stream flow requirement for streams that have been identified as critical habitat for listed species. To ensure projects will not unreasonably affect instream beneficial uses and public trust resources including fish and wildlife (Water Code§ 275), the Department recommends the amendment direct project proponents to identify low-flow ecological threshold flows and habitat connectivity flows necessary to maintain the health of aquatic instream and riparian resources. We recommend conducting this analysis in all stream reaches impacted by the project at or below the point of		

No.	Comment	Response	Categories
	discharge. The establishment of a seasonally appropriate low-flow threshold helps protect biological productivity during critically low-flow time periods by supporting stream channel forms and riparian communities that directly affect aquatic life. Otherwise, operators at wastewater treatment facilities may not have the necessary knowledge to regulate water discharge at certain times of year to prevent impacts to aquatic and riparian species and habitats. Flow levels decreasing below the low-flow threshold are typically characterized as rapidly declining in aquatic habitat and aquatic benthic invertebrate productivity, and are generally stressful and potentially lethal conditions for fish and wildlife, and the greater aquatic ecosystem. Aquatic habitat connectivity flows should be identified as well where appropriate, allowing for movement, passage, and persistence of aquatic biota. Incorporating these flow analyses will help ensure the protection of the public trust and its beneficial uses. Thus, water currently discharged and allowed to return to streams, as required by current guidelines, should remain unchanged until flow regimes that are protective are established.		

No.	Comment	Response	Categories
3.008	ENVIRONMENTAL DATA CEQA requires that information developed in environmental impact reports and negative declarations be incorporated into a database, which may be used to make subsequent or supplemental environmental determinations. (Pub. Resources Code,§ 21003, subd. (e).) Accordingly, please report any special status species and natural communities detected during Project surveys to the California Natural Diversity Database (CNDDB). The CNNDB field survey form can be found at the following link: https://www.wildlife.ca.gov/Data/CNDDB/Submitting-Data#4452442-p0df-field-survey-form. The completed form can be mailed electronically to CNDDB at the following email address: CNDDB@wildlife.ca.gov. The types of information reported to CNDDB can be found at the following link: https://www.wildlife.ca.gov/Data/CNDDB/Plants-and-Animals.	No biological surveys were required during the CEQA review for this project.	13. Comment out of scope
3.009	**FILING FEES** The Project, as proposed, would have an impact on fish and/or wildlife, and assessment of filing fees is necessary. Fees are payable upon filing of the Notice of Determination by the Lead Agency and serve to help defray the cost of environmental review by CDFW. Payment of the fee is required in order for the underlying project approval to be operative, vested, and final. (Cal. Code Regs, tit. 14, § 753.5; Fish & G. Code,§ 711.4; Pub. Resources Code,§ 21089.)	State Water Board staff agrees that filing fees are required in this situation. The following provision will be included in the State Water Board resolution adopting the Amendment: "Directs staff, upon approval by OAL, to file a Notice of Decision with the Secretary for Natural Resources and transmit payment of the applicable fee as may be required to the Department of Fish and Wildlife pursuant to Fish and Game Code section 711.4."	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
3.010	**CONCLUSION** CDFW appreciates the opportunity to comment on the Draft SR/SED and Draft Amendment to the Recycled Water Policy to assist the State Water Resources Control Board in identifying and mitigating Project impacts on biological resources. The Department also recognizes and appreciates the State Water Resources Control Board adding language encouraging early coordination by the petitioner with the Department when preparing a wastewater change petition, and the consideration of cumulative impacts while reviewing future wastewater change petitions. Due to the issues presented in this letter, CDFW concludes that the Draft SR/SEO and Draft Amendment to the Recycled Water Policy does not adequately identify or mitigate the Project's significant, or potentially significant, impacts on biological resources. CDFW has concerns that the State Water Resources Control Board may not have the basis to approve the project or make "findings" as required by CEQA unless the environmental document is modified to eliminate and/or mitigate the cumulative impacts, as reasonably feasible (CEQA Guidelines, §§ 15074, 15091 & 15092).	The comment is a concluding paragraph that summarizes the preceding paragraphs in the comment letter and suggests that the State Water Board must amend the Staff Report with SED. The commenter suggests that the Amendment could have cumulative impacts and therefore must include an analysis of those impacts and inclusion of mitigation measures to lessen environmental impacts. As explained in response to Comment 7.008, any potential cumulative impacts resulting from approval of a wastewater change petition filed under Water Code section 1211 will be analyzed for all environmental impacts, including potential cumulative impacts, when the State Water Board considers a wastewater change petition for a specific recycled water project. At this stage, it would be speculative to try to predict these impacts, or even the projects that might cause these impacts. Consequently, the State Water Board need not modify the Staff Report with SED to eliminate and/or mitigate cumulative impacts.	15. CEQA
4	**California Farm Bureau Federation** **Commenter: Justin Fredrickson**		
4.001	The Water Board's draft amendments to its statewide Policy for Water Quality Control for Recycled Water ("Draft Policy" dated 5/9/2018) affect numerous important areas of statewide water policy interest to California agriculture. With all indications pointing to a future where technological innovation and careful stewardship of limited available water supplies are increasingly important, the Draft Policy provides important direction for development of recycled water	The commenter is supportive of the Amendment; no change is requested.	12. General Comment

No.	Comment	Response	Categories
	supplies in an exceedingly complex regulatory environment.		
4.002	Farm Bureau generally commends the Draft Policy's "Benefits of Recycled Water."	The commenter is supportive of the Benefits section of the Amendment; no change is requested.	12. General Comment
4.003	Farm Bureau also appreciates the Water Board's commitment to substantially augment and diversify California's overall water portfolio with its bold statement of the goal to increase the use of recycled water from 714,000 acre-feet per year to 1.5 million afy by 2020 and 2.5 million afy by 2030.	The commenter is supportive of the numeric recycled water goals in section 3.1 of the Amendment; no change is requested.	3. Goals, mandates, and reporting requirements
4.004	To achieve these goals, however, it is important to ensure that *all* aspects of the Water Board's Draft Policy are working toward their achievement—and, conversely, that no feature of the Policy is, in any way, avoidably working against it. In keeping with these dual objectives, Farm Bureau suggests some key revisions to reduce potential obstacles to expeditious project permitting.	This comment is a leading statement to the remaining comments from this commenter; no change is requested.	12. General Comment
4.005	As local Groundwater Sustainability Agencies ("GSAs") begin implementation of local Groundwater Sustainability Plans ("GSPs"), and as California water managers, localities, and state agencies work to meet the challenges of future droughts and climate variability, recycled water will assume an increasingly important role in water management. For agriculture, as highlighted in the Draft Policy, important emerging opportunities include voluntary ag-urban partnerships in agricultural areas adjacent to urban centers, voluntary opportunities to safely irrigate crops, voluntary opportunities to supplement and diversify existing agricultural water supplies, meeting future challenges under SGMA and from a changing climate, recharging groundwater with recycled water (whether	This comment is linked to Comment 4.006; no change is requested.	12. General Comment

No.	Comment	Response	Categories
	directly, or via in lieu recharge) and, in coastal areas, providing a barrier against saltwater intrusion.		
4.006	At the same time, as highlighted in the Draft Policy, an expanded role for recycled water entails numerous complexities and requires careful balancing of potential risks and concerns. Notwithstanding potential benefits of recycled water for agriculture, areas of potential concern include: • The importance of developing recycled water as a voluntary supplemental water source, and not as a waste disposal method or as a substitute for traditional water sources; • Maintaining existing water rights and avoiding potential loss through non-use; • The need for full, site-specific understanding of potential practical and agronomic constraints on recycled water uses in agriculture; • The need for technical assistance and on-going research concerning recycled water use in agriculture and for potential groundwater recharge; • Concerns relating to potential consumer perception issues and basic public health and safety; • Concerns relating to potential effects on downstream users; • The need for robust input and involvement from local growers at the local and regional level; • Potential liability issues; • Recognition of the time, complexity, and economic burdens associated with project permitting, regulatory compliance, reporting, monitoring, etc.	The commenter notes the complexity of the expansion of recycled water use in California. The Amendment aims to address some of this complexity by providing statewide consistency and direction in the permitting of recycled water projects.	12. General Comment

No.	Comment	Response	Categories
4.007	While incentives for robust development of recycled water supplies to meet the Water Board's 2020 and 2030 goals, Farm Bureau has reservations concerning the Draft Policy's proposed use of the Water Board's waste and unreasonable use authorities to inflexibly force local water agencies to put available recycled water to beneficial use in every circumstance.3 It is important to recognize that there may be circumstances in which recycled water is available, but where its use is impractical, infeasible, or undesirable for the one reason or another. In such cases, the Water Board's Policy should afford it sufficient enforcement discretion to refrain from an exercise of its section 275 authorities as appropriate.	See response to Comment 2.006.	3. Goals, mandates, and reporting requirements
4.008	Farm Bureau appreciates the Draft Policy's inclusion of streamlining that would empower a regional board to "find that groundwater sustainability plans developed pursuant to [SGMA] include water quality components that sufficiently address the components of and therefore are functionally equivalent to a salt and nutrient management plan."	The commenter supports Amendment language relating to SNMPs; no change is requested.	6. Salt and nutrient management plans
4.009	Allowing regional salt and nutrient management plans to "leverage the use of groundwater monitoring wells from other regulatory programs, such as the Irrigated Lands Regulatory Program ["ILRP"] and [SGMA]," is also helpful to reduce duplication, complexity, and expense.	The commenter supports Amendment language relating to SNMPs; no change is requested.	6. Salt and nutrient management plans
4.010	Similarly, helpful flexibility is provided in the provision (at Section 6.2.1.5, on page 13 of the Draft Policy) to afford the regional boards discretion to "adopt plans or programs of implementation for the protection of beneficial uses in basins whether or not a salt and nutrient plan has been accepted by the regional board […] or a basin plan amendment has been adopted by the regional water board[…]"	The commenter supports Amendment language relating to SNMPs; no change is requested.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
4.011	In short, streamlining features that reduce costs and shorten processes by allowing requirements to be met through already required regional salt and nutrient management plans, irrigated lands regulatory programs, groundwater sustainability plans, streamlined anti-degradation analyses and the like, are generally positive and important to achieve the Board's ambitious 2020 and 2030 goals for statewide recycled water use.	The commenter supports Amendment language relating to SNMPs; no change is requested	6. Salt and nutrient management plans
4.012	One key exception is the third proposed requirement for "streamlined" permitting for "irrigation projects" using nonpotable recycled water under 7.3.1.3 of the Draft Policy. Specifically, the proposed criterion that irrigation projects "minimize percolation … below the root zone … in a manner … necessary to satisfy the plant's root evapotranspiration requirements," etc. would improperly prescribe specific agronomic practices. The proposed criterion is improper and unnecessary in light of the first two proposed criteria (relating to "[c]ompliance with all applicable laws and regulations" and an "approved engineering report") and where, as proposed, a project eligible for streamlining is *already* one that "would not cause or contribute to pollution or nuisance, or otherwise fail to comply with the applicable basin plan or State Water Board plans or policies." Since the background context of "applicable laws and regulations" and of "the applicable basin plan or State Water Board plans or policies" would *already* include such things as any required regional salt and nutrient management plans, the IRLP, SGMA, and the Water Board's anti-degradation and recycled water regulations, these additional provisions would only serve to slow permitting of beneficial recycled water projects, strongly deterring farmers from voluntary wider adoption of recycled water use. Because such unintended consequences are directly contrary to the	Section 7.3.2 of the May 9 draft Amendment, addressing criteria for streamlined permitting, was removed from the Amendment. Section 7.4 was added to the Amendment to restrict the regional water board from imposing project-specific groundwater monitoring requirements for non-potable recycled water projects if certain criteria are met, and excluding unique, site-specific conditions. One of the criteria, for irrigation projects, is application of recycled water at rates that would minimize percolation of recycled water below the root zone. See also Comment 5.002. Application of recycled water at rates that would minimize percolation below the root zone is not a requirement of all non-potable recycled water projects and therefore does not improperly impose specific agronomic practices. Rather, it is a criterion that is necessary to justify the restriction of the regional water board to impose project-specific groundwater monitoring. Additionally, the criterion is to minimize, not eliminate, percolation below the root zone and allows consideration of leaching, climate, and other site-specific conditions.	7. Permitting for Non-potable

No.	Comment	Response	Categories
	Water Board's laudable 2020 and 2030 goals for statewide recycled water expansion, Farm Bureau recommends deleting the excessive and unnecessary third criterion under 7.3.2.1.3, page 19, of the Draft Policy.		
4.013	Farm Bureau generally supports the Draft Policy's approach to interagency cooperation in furtherance of the Policy's goals including collaboration with the California Department of Food and Agriculture, "with grower coalitions, third-party technical service providers, public and private agricultural entities, and academia."	The commenter is in support of section 4.5 of the Amendment that describes the role of the California Department of Food and Agriculture; no change is requested.	4. State agency roles
4.014	At the same time, to ensure advancement of the Draft Policy's goals with respect to recycled water, the Draft Policy should more specifically establish a framework for research and technical assistance related to the many technical and agronomic issues arising uniquely in an agricultural setting. For example, this could include work with the University of California's Cooperative Extension offices, with the NRCS, and with agricultural researchers at California private and public universities and colleges.	Providing a framework for technical and agronomic issues arising uniquely in an agricultural setting is outside the scope of this Amendment. These issues are more appropriately addressed through the Irrigated Lands Regulatory Program. However, to promote the use of recycled water for agriculture, the State Water Board partners with research entities to investigate impediments to the use of recycled water in California, including issues unique to agriculture, and encourages utilities, agricultural stakeholders, and others to participate in funding and conducting research related to expanding recycled water use. More information on the State Water Board's Recycled Water Research Program can be found on the program webpage: https://www.waterboards.ca.gov/water_issues/programs/water_recycling_policy/recycledwater_research.shtml	13. Comment out of scope

No.	Comment	Response	Categories
4.015	To facilitate and more clearly define the precise nature of interagency cooperation between the Water Board and CDFA, the Water Board's policy might also establish the pathway toward an eventual MOU for implementation.	The requested change is outside the scope of this Amendment. The State Water Board has a Memorandum of Agreement with California Department of Food and Agriculture to facilitate interagency cooperation. The State Water Board supports further discussion on updating the Memorandum.	13. Comment out of scope
4.016	Thank you for the opportunity to provide comments on the draft amendments to its statewide Policy for Water Quality Control for Recycled Water. As noted, however, in order to ensure that these goals are achieved, the Recycled Water Policy must more forthrightly consider and address the unique needs of agriculture.	Comment noted. No change is requested.	12. General Comment
4.017	The Water Board must exercise its section 275 authorities reasonably, with flexibly and due restraint.	See responses to Comments 1.002 and 2.006.	3. Goals, mandates, and reporting requirements
4.018	Proposed streamlining measures should maximally reduce required processes and costs, while at the same adequately protecting public health and the environment.	See response to Comment 4.006.	12. General Comment
4.019	Finally, and very emphatically, the Board's Policy should in no way dictate specific agronomic practices or otherwise improperly constrain a farmer's ability manage his lands, produce an agricultural commodity, and successfully move it to market.	See response to Comment 4.012. No specific change is requested.	12. General Comment

No.	Comment	Response	Categories
5	**Calleguas Creek Watershed Management Plan** **Commenter: Lucie McGovern**		
5.001	The Stakeholders Implementing TMDLs on the Calleguas Creek Watershed (Stakeholders) appreciate the opportunity to provide comments on the proposed amendment to the Statewide Recycled Water Policy (Proposed Policy). The Stakeholders appreciate most of the modifications to the Proposed Policy and the effort that has put into incorporating meaningful changes based on issues identified during implementation of the existing Policy. In particular, the Stakeholders support the following: The clarification of the procedures for meeting antidegradation requirements and the provision of options for development and adoption of the Salt and Nutrient Management Plans (SNMPs).	The commenter supports Amendment language relating to SNMPs and adoption provisions; no change is requested.	6. Salt and nutrient management plans
5.002	Section 7.3.2.2.3 modifications that clarify project-specific monitoring should not be required in most cases for individual recycled water irrigation projects. Monitoring programs should be designed to achieve multiple goals and characterize impacts to groundwater conditions from multiple inputs. These goals can best be achieved through monitoring networks established through SNMPs or other regional programs after consideration of basin characteristics and development of a conceptual model of the basin. Imposing project by project monitoring requirements can be costly and not warranted in most cases and prevents coordination of resources with other programs, as supported by Section 6.2.4.1.2 of the Proposed Policy.	Section 7.3.2.2.3 was removed from the Amendment. Section 7.4 was added to the Amendment partly in response to this comment. This section addresses project-specific monitoring stating, *"Site-specific groundwater monitoring.* For non-potable recycled water projects, project-specific receiving water and groundwater monitoring shall not be required if the criteria below are met, unless the regional water board determines there are unique site-specific conditions, or unless such project-specific monitoring is required under the accepted salt and nutrient management plan or applicable basin plan". Unique site-specific conditions include but are not limited to areas where recycled water is proposed to be used for irrigation over high transmissivity soils over a shallow (5' or less) high quality groundwater aquifer or proposed to be stored in unlined ponds where the regional water board	7. Permitting for Non-potable

No.	Comment	Response	Categories
		determines that it will result in an unacceptable threat to groundwater quality. The criteria are: 1.1.1. For irrigation projects, application of recycled water at rates that minimize percolation of recycled water below the plants' root zone, i.e., in a manner (1) necessary to satisfy the plants' evapotranspiration requirements, (2) that considers allowances for supplemental water, irrigation distribution uniformity, leaching, and climate, and (3) when the soil is not saturated. 1.1.2. Appropriate use of fertilizers that takes into account the nutrient levels in the recycled water and nutrient demand by plants."	
5.003	The new method for prioritizing basins for development of SNMPs and the acknowledgement that not all basins are threatened due to salts and nutrients. We support the use of the prioritization for other uses than just deciding on the need for a SNMP. For example, the Stakeholders support the discussion on Draft Staff Report on page 52 to use the characterization to "facilitate permitting of recycled water projects. Recycled water projects in basins where salts and nutrients do not represent a threat to groundwater quality objectives would require less evaluation and potentially fewer permit requirements". The Stakeholders appreciate consideration of opportunities to streamline requirements for use of recycled water in areas where salt and nutrients are not a threat to groundwater quality.	The commenter supports Amendment language relating to regional board determinations of basins or subbasins where an SNMPs is required; no change is requested.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
5.004	One of the goals of the Stakeholders in their over 10 years of TMDL implementation has been to effectively integrate the multitude of requirements faced by local agencies and agriculture in the watershed to identify efficient and effective management actions to address these requirements. Because this has been a focus of the group for many years, we have gained insights into some of the challenges posed by trying to align with multiple, sometimes conflicting, mandates from the State. For example: • Water conservation mandates have resulted in less water and higher salt content water from the treatment plants in the Calleguas Creek Watershed. These observations are supported by the recent *Study to Evaluate Long-Term Trends and Variations in the Average Total Dissolved Solids Concentration in Wastewater and Recycled Water* developed by the Southern California Salinity Coalition. As noted in that report, "A majority of WWTPs in this study exhibited an increase in influent and effluent TDS concentrations over the past few decades. This study found that the two primary contributors to increasing TDS in WWTPs are (1) volume-weighted source water quality and (2) decreased indoor water use." At times, this results in effluent that exceeds water quality objectives for salts in the local groundwater basins. The requirements to comply with water conservation mandates without relief for strict salt requirements for recycled water use could result in a net decrease in available water supplies. The Stakeholders have managed this impact by consideration of regional solutions, such as groundwater desalters, and request the policy maintain flexibility to manage salts on a regional basis rather than focus on local, project by project impacts.	The commenter supports Amendment language relating to SNMPs basin or subbasin approach as opposed to project by project analysis; no change is requested.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
5.005	Balancing the needs of various beneficial uses of the water is challenging in effluent- dependent waterbodies. For example, requirements to maintain instream flows need to be balanced with recognition that these flows did not exist prior to the importation of State Water Project water into the watershed. Additionally, stringent water quality requirements to protect agriculture can have the adverse impact of making water either too expensive or not available to the agricultural users which has a more drastic impact on beneficial uses than water quality. Flexibility in meeting these various demands is needed to allow local Stakeholder to identify creative solutions to balance the various water needs.	See response to Comment 3.007.	5. 1211 and WW Change Petitions
5.006	In some cases, local Regional Water Board constraints and requirements have slowed or reduced the ability of recycled water projects to move forward. While projects may be aligned with the Recycled Water Policy in concept, stringent interpretations of some requirements have removed some of the flexibility for local planning and consideration included in the Policy. The Stakeholders encourage the State Water Board to continue to promote the use of recycled water as a beneficial use and remove barriers to uses that have minimal impacts on groundwater basins.	No change is requested. Section 2 of the Amendment describes some of the myriad benefits of the use of recycled water. The State Water Board has developed several statewide orders and regulations in the last ten years to expedite permitting of recycled water projects and remove barriers to recycled water use. Examples of these regulations are the updates to CCR, title 22 for groundwater recharge via surface and subsurface application; updates to CCR, title 22 for reservoir water augmentation; and State Water Board adoption of Order WQ 2016-0068-DDW, Water Reclamation Requirements for Recycled Water Use, which was developed expressly to remove permitting barriers for low-threat recycled water projects.	12. General Comment
5.007	The Stakeholders are concerned that the conflicting mandates and local restrictions will eventually raise the cost of recycled water and make its use infeasible. While we recognize many of these issues are challenging topics that will require ongoing discussions to resolve, the Stakeholders request that the State Water Board, in development of new policies, consider potential impacts to other programs and provide	The commenter is making a general statement about development of new new policies; no change is requested. The State Water Board encourages the safe use of recycled water in a manner that implements state and federal water quality laws and protects public health and the environment. The Amendment provides flexibility in recycled water permitting options selected by the permittee and regional water board and highlights the varying roles of different agencies and groups in the implementation of	12. General Comment

No.	Comment	Response	Categories
	flexibility within the policies to grow and evolve the programs in response to these changes.	recycled water projects (see section 4 of the Amendment). The Amendment provides a framework to expedite the permitting of recycled water projects in a manner that implements state and federal water quality laws.	
5.008	It would also be very helpful to have an understanding of the overarching policy objectives that should be used in making decisions amongst conflicting actions. The Stakeholders recommend including language in the Proposed Policy that notes that the California Water Action Plan is the overarching document that should guide decision-making when conflicts arise.	The California Natural Resources Agency, the California Environmental Protection Agency, and the California Department of Food and Agriculture developed the California Water Action Plan (WAP), which was signed by Governor Edmund G. Brown Jr. and released to the public on January 22, 2014. The WAP has been developed to meet three broad objectives: 1) more reliable water supplies; 2) the restoration of important species and habitat; and 3) a more resilient, sustainably managed water resources system (water supply, water quality, flood protection, and environment) that can better withstand inevitable and unforeseen pressures in the coming decades. Although the Amendment is consistent with these goals, decisions regarding recycled water should be based on the more specific Amendment instead of the more general WAP.	12. General Comment
5.009	Additionally, the Stakeholders have identified some modifications to the Proposed Recycled Water Policy that could support addressing these challenges in the future that are discussed in more detail in the following sections: 1. Allow for watershed management rather than basin by basin management by including “or watershed” whenever basin/subbasin requirements are included in the Proposed Policy and Draft Staff Report. 2. Remove the requirement for a fate and transport analysis in the SNMP and replace it with a conceptual model requirement. 3. Remove references to water required to be discharged for maintaining in-stream beneficial uses	This is the introductory statement to the comment letter, followed by Comments 5.010 to 5.029.	12. General Comment

No.	Comment	Response	Categories
	as disposal. 4. Remove references to Regional Board authority to implement alternative implementation and management plans. 5. Remove requirement to comply with other waste discharge requirements and conditional waivers of waste discharge requirements. 6. Allow for existing CEC monitoring to be used for initial assessment and baseline monitoring and revise the quality assurance and quality control requirements for the monitoring.		
5.010	**Include Provisions Acknowledging Management of Recycled Water Policy Requirements on a Watershed Basis** When the 2009 Recycled Water Policy was adopted, the Stakeholders submitted a comment letter requesting that the Policy allow for implementation on a watershed scale, rather than just a groundwater basin by groundwater basin approach. Multiple changes were made to align the document with the comments, but some of the intent of the 2009 to allow for the watershed approach has been lost or was not considered when developing the 2018 Proposed Policy.	Section 6.1.2 of the Amendment retains language regarding the need to manage salts "on a basin-wide or watershed-wide basis." The primary purpose of the SNMP program is protection of groundwater, and the groundwater basin is the fundamental unit of groundwater supply. As such, the SNMP portion of the policy emphasizes groundwater basins and subbasins. The Amendment language does not restrict stakeholder groups from taking a watershed approach.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
5.011	Additionally, during development of the SNMP in the watershed, the Stakeholders have identified other aspects of the policy requirements that create challenges for effectively implementing recycled water projects and the Policy. In the Calleguas Creek Watershed, recycled water infrastructure crosses groundwater basin boundaries and the groundwater basins themselves are connected and serve as conduits for transport of both water and constituents between basins. However, the water quality objectives for salts for the groundwater basins were established based on historic water quality measurements and not the consideration of either the groundwater basin geology, groundwater movement, or beneficial uses. As a result, recycled water purveyors can be faced with meeting multiple different water quality objectives for different water application sites if strict application of the water quality objectives is used for permitting. The Stakeholders support the discussion in the Draft Staff Report on page 53 regarding the possibility for modifying water quality objectives through the SNMP and request that the Policy support flexibility for including salts limits other than the water quality objectives for recycled water projects that are unlikely to impact beneficial uses of a groundwater basin.	The Amendment supports flexibility in many respects, however the request to employ salts limits other than the water quality objectives for recycled water projects conflicts with Water Code requirements that water quality objectives be set at the level needed to ensure the reasonable protection of beneficial uses. (Wat. Code sec. 13241). Therefore, modifying objectives through the basin planning process is the appropriate way to address the comment.	6. Salt and nutrient management plans
5.012	Modifications to the Proposed Policy to allow watershed-wide management of salts and nutrients rather than basin-by basin requirements, consistent with the modifications made in 2009, would support the continued use of recycled water in a consistent manner across groundwater basins that protects beneficial uses in the Calleguas Creek Watershed. The Stakeholders request that all discussion of basin/sub basin in the Proposed Policy and Draft Staff Report be replaced by basin/sub-basin or watershed. Requested change: Add “or watershed” to all	See response to Comment 5.010.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	references of basin/sub-basin in the Proposed Policy and Draft Staff Report be replaced by basin/sub-basin or watershed.		
5.013	More flexibility should be provided for analyses required by the Salt and Nutrient Management Plans to recognize differences in basin characteristics and allow better integration with other planning efforts	Section 6.2.4. of the Amendment acknowledges that "the degree of specificity within SNMPs will be dependent on a variety of site-specific factors." The Policy specifies the elements to be included in SNMPs in general terms that allow substantial flexibility.	6. Salt and nutrient management plans
5.014	The Stakeholders have been working for several years to develop a Salt and Nutrient Management Plan (SNMP) for the groundwater basins within the watershed. Through the evaluation of groundwater basin characteristics, analysis of assimilative capacity, and definition of proposed projects, the Stakeholders have identified that many of the proposed projects are unlikely to have a significant direct impact on the water in groundwater basins that is used for beneficial uses. The finding is based on the fact that in many areas there are confined groundwater basins or very deep groundwater that is not directly recharged by land application of recycled water. Additionally, trend analysis for many of the groundwater wells shows no trends or decreasing trends even as recycled water use has increased in the watershed. Finally, the majority of the projects are landscape or agricultural irrigation projects that are required to be applied at agronomic rates. As a result, infiltration of significant salt and nutrient loads to the groundwater basin is unlikely. Situations like those observed in the Calleguas Creek SNMP are supported by statements in the Draft Staff Report. For example, Section 4.8.4, page 56 states: "While some recycled water projects have measurable contributions to the total salt and nutrient loading in a	See responses to Comments 4.012 and 5.015.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	given groundwater basin, many recycled water projects have negligible contributions to the total salt and nutrient loading in a given groundwater basin. More often, it is other entities or activities such as agriculture, industry, wastewater treatment plant operations, or water agencies importing high-salinity water that result in significant contributions of salts and/or nutrients to a groundwater basin." Additionally, Section 3.4.1.4, page 17 notes that application of recycled water at agronomic rates is a BMP that limits the impacts of recycled water for irrigation uses and other types of uses are unlikely to have sufficient loading to impact water quality. "The Policy states that use of recycled water consistent with the Policy is to the benefit to the people of the state. The Uniform Statewide Recycling Criteria impose limitations on the uses of recycled water, based on the level of treatment and the specific use of recycled water to protect public health. By restricting the use of recycled water to those meeting the Uniform Statewide Recycling Criteria, the Policy ensures that recycled water is used safely. To the extent that the use of recycled water may result in some waste constituents entering the environment after effective source control, treatment, and control measures are implemented, limiting the use of recycled water to agronomic rates is part of the suite of treatment, storage and application measures that comprise best practicable treatment or control for uses with frequent or routine application, such as landscape or agricultural irrigation. Other types of uses that may be approved, such as dust control, firefighting, hydrostatic testing, and other short term or infrequent application are unlikely to result in sufficient loading of waste constituents that impact water quality."		

No.	Comment	Response	Categories
	Despite these acknowledgements, the Proposed Policy still requires the SNMP to include development of a fate and transport analysis.		
5.015	Development of models, particularly for complex basins like those in the Calleguas Creek Watershed can be expensive and time consuming and may not meaningfully inform the SNMP analysis or conclusions. Through the development of the Calleguas SNMP, the Stakeholders have identified that use of monitoring data, assessment of trends, and a good understanding of the geology and basin characteristics is sufficient for determining the likely impacts of irrigation projects, particularly where the irrigation is not a new project, but just a modification of the water source for existing irrigated areas. While fate and transport analyses may be more important for groundwater recharge projects, the Stakeholders request that fate and transport analyses not be required for all SNMPs.	The Policy allows flexibility in developing SNMPs, including the level of effort that may be involved in characterizing the fate and transport of salts and nutrients. Section 6.2.4. of the Amendment acknowledges that "the degree of specificity within SNMPs will be dependent on a variety of site-specific factors." This degree of specificity also applies to the level of effort and degree of quantification involved in the fate and transport analysis. Stakeholder groups working with technical experts determine the level of detail and complexity appropriate for the fate and transport analysis, given the complexity of the basin, and the level of threat posed by salt and nutrient loading to water quality objectives. Stakeholder groups are encouraged to consult and engage in discussions with the regional water boards when developing SNMPs. However, assimilative capacity is a quantitative term, and estimation of assimilative capacity requires some degree of modeling and calculation. The Staff Report with SED was revised to provide further clarification regarding fate and transport analysis in SNMPs.	6. Salt and nutrient management plans
5.016	Throughout Section 3.4 of the Draft Staff Report, a conceptual model for the SNMP is often referenced, but fate and transport analysis is rarely discussed.	See response to Comment 5.015.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
5.017	Additionally, on Page 56, the follow-up assessment of the SNMP is based on the analysis of trend data and a comparison to the conceptual model "If the results of this assessment indicate that observed trends are generally in agreement with predicted trends in the SNMP and that the key assumptions of the conceptual model in the SNMP are still valid, then further updates to the SNMP would not be needed. Alternatively, if the results of this assessment indicate that the conceptual model components in the SNMP are no longer valid and/or that observed trends are significantly different from those predicted in the SNMP, then the SNMP would need to be revised to address those changes." However, the SNMP requirements in the Proposed Policy do not include a conceptual model.	"Conceptual model," as used in the Staff Report with SED, is meant in a general sense of the term as "a representation of the groundwater system." In this generalized meaning, the SNMP components listed in section 6.2.4.3 of the Staff Report with SED are intended to comprise a general conceptual model for the basin. Developing estimates of assimilative capacity, salt and nutrient loading estimates, source identification and assessing fate and transport all comprise an overall conceptual model for salts and nutrients in a groundwater basin. As such, if an SNMP included a predicted overall trend in the concentrations of salts and nutrients in a groundwater basin based on loading and assimilative capacity estimates, that would be part of the overall conceptual model of the basin.	6. Salt and nutrient management plans
5.018	The Stakeholders agree that a conceptual model is important and would be a better requirement than a fate and transport analysis. Conceptual models could be used to describe qualitatively the fate and transport of salts and along with monitoring and trend data, as described in the new data analysis section, would be sufficient in many cases for the analysis necessary to evaluate projects. This saves costs in developing models and is preferable to the simplified models that may not adequately assess groundwater conditions. Defining the development of a conceptual model does not preclude conducting more detailed analyses but avoids the requirement to conduct those analyses in areas where it is not warranted based on the conceptual model.	See responses to Comments 5.015 and 5.017.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
5.019	Use of a conceptual model would also help address the concerns raised in Section 3.4.3.2 of the Draft Staff Report regarding the limitations of the monitoring data and the modeling that has been conducted. The conceptual model would help identify areas where application of recycled water or other sources may result in localized groundwater impacts that could impact beneficial uses. However, we disagree with the assessment in this section that the approaches taken overestimate assimilative capacity overall due to the limitations of the analysis or the use of deeper aquifer data. Rather, the analyses in most cases accurately capture the overall ability of the groundwater basin to assimilate salts and nutrients, but do not address localized elevated concentrations. However, localized impacts do not necessarily have an impact on beneficial uses of the groundwater basin. For example, if they occur in an area where there are no wells, then the basin likely has the ability to assimilate the salts and nutrients before they impact beneficial uses. It is important to distinguish between localized water quality concentration increases and impacts on the beneficial uses of the groundwater basin. If no short term localized impacts are allowed when no wells or other beneficial uses are impacted, recycled water use could be significantly curtailed. The Stakeholders request that Section 3.4.3.2 of the Draft Staff Report be modified to remove the discussion about the data limitations impacting the assimilative capacity analysis for the basins.	The focus of the discussion in section 3.4.3.2 of the Staff Report with SED is on vertical mixing, and the underrepresentation of water quality data from shallower portions of the groundwater basin. Even if one accepts that the mass-balance, fully mixed, conceptual model for a groundwater basin is appropriate, the lack of groundwater quality data for the shallower portions of the aquifer, where the majority of the salt and nutrient mass resides, results in an underestimate of the total mass of salts and nutrients in the aquifer. This underestimate of total mass results in an overestimation of the total assimilative capacity of the aquifer. State Water Board staff concurs with the comment that it is important to place localized water quality concentration increases and impacts in the proper context, with respect to the beneficial uses of the groundwater basin as a whole. Section 3.4.3.2 of the Staff Report with SED was revised to clarify that the mixing mass-balance model frequently used in SMMPs does not address localized elevated concentrations in shallower portions of the aquifer or in localized geographic areas, but that these localized impacts may not necessarily represent an underestimation of the assimilative capacity of the entire groundwater basin or the long-term salt and nutrient balance of the basin as a whole.	6. Salt and nutrient management plans
5.020	The removal of the fate and transport analysis requirements would also support the use of Groundwater Sustainability Plans as functionally equivalent documents as conceptual models could more easily be incorporated into GSP development than modeling analysis and results.	See response to Comment 5.018.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
5.021	***Requested change: Remove the requirement to develop a fate and transport analysis and replace it with a conceptual model that includes discussion of the fate and transport of salts and nutrients by modifying Section 6.2.4.3.(d) of the Proposed Policy and Section 3.4.3.2 of the Draft Staff Report as follows:*** 6.2.4.3. (d) Salt and nutrient source identification, basin/ or sub-basin assimilative capacity and loading estimates, together with a conceptual model of the fate and transport of salts and nutrients.	The Staff Report with SED was revised to include a discussion regarding the potential ranges and levels of effort that may be needed for the fate and transport evaluation. However, as stated above, estimation of assimilative capacity is inherently quantitative, and it is not accurate to state that the SNMP need only include a conceptual level of analysis of fate and transport.	6. Salt and nutrient management plans
5.022	3.4.3.2. Stakeholder groups that have led the effort to develop SNMPs have relied on water quality data available from existing domestic supply wells. This practice is consistent with the Policy, which states that use of existing wells is preferred. However, these domestic wells are typically screened in deeper portions of aquifers in groundwater basins. They frequently do not provide data that are representative of shallower portions of the aquifer, which are typically most impacted by salt and nutrient loading. Also, many individual or small domestic water supply systems are sourced from shallower aquifers that are not represented by data collected from deeper supply wells. Because individual or small systems are not required to report water quality data to the state, the data from these systems are not readily available. ~~*By excluding data from these shallow domestic systems, SNMPs frequently overestimate the total available assimilative capacity of the basin.*~~ The other related technical challenge is the use of simple mass balance models to estimate the assimilative capacity of a groundwater basin. The Policy states that SNMPs shall include: “salt and nutrient source identification, basin/sub-basin assimilative capacity and loading estimates, together	See responses to Comments 5.015 and 5.019.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	with fate and transport of salts and nutrients." But no guidance is provided regarding the complexity of this analysis, and most SNMPs have relied upon a very simplistic mass-based approach that assumes complete mixing of salt and nutrient loads into the basin throughout all of the groundwater in the basin. However, salts and nutrients loaded into a basin from surface sources do not typically mix throughout the entire depth of the basin. Rather, salts and nutrients loaded into a basin from the surface can concentrate in shallower aquifers where they end up affecting domestic water supplies, without mixing with groundwater in the deepest portions of the aquifer. Salt and nutrient loads also can remain in relatively confined areas laterally as well, without mixing over the entire basin area. Like the effect of relying on water quality data from deep domestic wells, the simplified total mixing assumption ~~many times results in an overestimate of the assimilative capacity of a basin, and~~ does not ~~consider~~ evaluate potentially significant impacts to shallow groundwater supplies or isolated areas that may have significant impacts.		

No.	Comment	Response	Categories
5.023	**Water discharged to maintain instream beneficial uses should not be categorized as disposal** In section 3.2.1.3 and 3.2.2. of the Proposed Policy, water required to be discharged to the stream to maintain minimum flows is to be reported under the category of disposal and is not recognized as a direct beneficial use of the water. If water has been designated as necessary for discharge to protect beneficial uses, the use should not be considered disposal of the water, particularly in cases where the water could be beneficially reused if not for mandates to maintain the stream flow. ***Requested change: Rename the reporting category Disposal in Section 3.2.1.3 and 3.2.2 to Surface Water Discharge.***	The reporting category titled "Disposal" was changed to "Discharge" in section 3.2.3 of the Amendment, formerly sections 3.2.1.3 and 3.2.2.2. Water Code section 13050(n) defines recycled water as water which, as a result of treatment of waste, is suitable for a direct beneficial use or a controlled use that would not otherwise occur and is therefore considered a valuable resource. The maintenance of instream flow, while a beneficial use of water, is not a direct beneficial use or a controlled use that otherwise would not occur. The volume of discharge required to maintain minimum instream flow is not considered recycled water under the definition in Water Code section 13050(n), so it would not be reported as such pursuant to the Amendment.	3. Goals, mandates, and reporting requirements
5.024	**Remove discussion of Regional Water Board Authority to adopt plans and programs of implementation under Water Code Section 13242** In Section 6.2.1.5, the Proposed Policy notes that "Regional Water Board may use its authority pursuant to Water Code section 13242 to adopt plans and programs of implementation for the protection of beneficial uses in basins whether or not a salt and nutrient management plan has been accepted by the regional water board pursuant to 6.2.3.2 or a basin plan amendment has been adopted by the regional water board pursuant to. 6.2.3.3." The Stakeholders are concerned that inclusion of this statement defeats the purpose of stakeholder developed SNMPs. While the Regional Water Boards may have this authority, including it expressly in the Proposed Policy implies that SNMP efforts are likely to be overridden by Regional Water Board implementation plans. In the Los Angeles Region,	Section 6.2.1.5 of the Amendment is revised to read as follows: "The provisions in 6.2 are not intended to limit regional water board authority pursuant to Water Code section 13242 to adopt plans and programs of implementation for the protection of beneficial uses." The purpose of section 6.2.1.5 is to clarify that the collaborative process in section 6.2 of the Amendment is not the only process available to the regional water boards to develop salt and nutrient-related basin plan amendments – in particular, to clarify how salt and nutrient planning and program implementation may take place in regions where there is no SNMP. If an SNMP is developed and accepted, then it will either be incorporated into a basin plan amendment or accepted as a technical document. If incorporated as a basin plan amendment, the commenter's concern is addressed. If it is accepted and not incorporated into basin plan amendments, then the Amendment is clear	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	recycled water permitting has been slowed and additional monitoring and restrictions have been placed on recycled water projects even when a SNMP has been adopted into the Basin Plan. The Stakeholders are concerned that including this language will continue to minimize the value of SNMPs in the Los Angeles Region and place additional barriers to recycled water use. ***Requested change: Remove Section 6.2.1.5***	that the accepted SNMP is to be used as a technical document to inform regional water board decisions. The regional water boards have been supportive of salt and nutrient management planning efforts, including those in the Los Angeles Region. The regional water boards have the authority to review SNMPs, and where the regional water board determines that the SNMP is not adequate, the regional water board will provide recommendations for what should be included or modified in order to accept the SNMP.	
5.025	**Remove requirement to comply with other waste discharge requirements and agricultural waivers** The addition of Section 7.3.2.1.7 requiring compliance with all requirements of applicable waste discharge requirements, waivers of waste discharge requirements, and waste discharge requirements or waivers regulating agricultural discharges from irrigated lands places requirements upon recycled water purveyors that are well beyond their authority to control. Recycled water purveyors do not have the obligation to meet requirements assigned to other dischargers. This language implies that by the act of supplying water to a user, the recycled water purveyor is responsible for all of the actions in the other order (e.g. management plan development, monitoring, reporting, etc.). By meeting the other requirements of the Universal Statewide Recycled Water Criteria and other requirements in the recycled water permit, the recycled water purveyor would be required to provide water of sufficient quality for the use. Whether or not that water is used in accordance with another discharger's waste discharge requirements	See responses to Comments 2.051 and 4.012. The referenced section was removed from the Amendment.	7. Permitting for Non-potable

No.	Comment	Response	Categories
	are not the responsibility of the water provider. The Stakeholders request that this provision be removed from the Proposed Policy. ***Requested change: Remove Section 7.3.2.1.7***		
5.026	**Clarify Elements of the Constituents of Emerging Concern (CEC) Monitoring Requirements** The discussion of the Quality Assurance and Quality Control Requirements in Attachment A include language that could be interpreted as requiring individual recycled water proponents to in essence "certify" the laboratories used for the CEC monitoring. The Stakeholders support the suggested modifications provided by the Coalition of Accredited Laboratories to clarify that Quality Assurance and Quality Control accreditation of laboratories should be conducted through an established method, such as the ELAP, and the only responsibility of the recycled water proponents is to use a certified lab and have a Quality Assurance Project Plan that specifies the analysis methods.	Section 1 of the Amendment was revised to clarify the recycled water producer must generate a QAPP that must be approved by the regional water board or State Water Board. See response to Comment 1.046 and section 4.14.4 of the Staff Report with SED regarding ELAP accreditation. See response to Comment 1.049 and section 4.14.4 of the Staff Report with SED, which discusses analytical method selection, validation, and approval.	10. CECs and Attachment A
5.027	Secondly, the Stakeholders would like to request inclusion of language that allows for existing CEC monitoring to be used for the initial assessment and baseline monitoring if it meets the requirements of Attachment A. In the Los Angeles Region, the Regional Water Board has required CEC monitoring in NPDES permits for many years. Most of the POTWs in the Calleguas Creek Watershed have existing CEC monitoring that should be of sufficient quality to meet the requirements of Attachment A. While these monitoring data have not been generated specifically for the purposes of assessing specific groundwater recharge or reservoir augmentation projects, the data should be able to be used to meet monitoring	Section 4 Phased Monitoring Requirements of the Amendment was revised to include the ability for the regional water board in consultation with the State Water Board to accept existing data to meet the monitoring requirements in the initial assessment and/or baseline monitoring phases, but that all recycled water treatment plants must conduct the standard operation monitoring phase. The existing data must have been generated from a recycled water treatment plant with an approved Title 22 Engineering Report and will be reviewed and accepted on a case-by case basis. The data does not necessarily have to be conducted exactly as prescribed by Attachment A, but should meet the intent of the requirements in attachment A and be adequately representative of conditions at the	10. CECs and Attachment A

No.	Comment	Response	Categories
	requirements for effluent data in the Policy when a project is developed. The data should be able to be used for both the initial assessment and baseline monitoring if the data meet the requirements in Attachment A. ***Requested change: Add language to Section 4.1 and 4.2 of Attachment A allowing for available existing monitoring data to be used in lieu of new monitoring for the initial assessment and baseline monitoring requirements***	recycled water treatment plant.	
5.028	**Correct that Los Angeles Region SNMPs have been adopted by Basin Plan Amendment** All accepted SNMPs in the Los Angeles Region to date have gone through the Basin Plan Amendment adoption process. Although the SNMPs did not result in modified water quality objectives, the programs of implementation were adopted into the Basin Plan along with CEQA and antidegradation analyses. The discussion should be corrected in the Draft Staff Report. ***Requested change: Modify the Draft Staff Report to clarify that the SNMPs in the Los Angeles Region have been adopted as Basin Plan Amendments***	The Staff Report with SED is updated in response to this comment.	6. Salt and nutrient management plans
5.029	Finally, the Stakeholders support the WateReuse Association's comments.	Comment noted. WateReuse Association's comments are addressed in the relevant sections of response to comments.	12. General Comment

No.	Comment	Response	Categories
6	**Carollo Engineers** **Commenter: Andrew Salveson**		
6.001	We are concerned about the removal of water recycling goals (page 1). While drought conditions have reduced or alleviated in most parts of CA, we are in a low water supply state with a large population and agricultural base. Removing reclamation goals sends the wrong message to the state.	Section 3.1.1 of the Amendment maintains the recycled water goals in the Policy. The stormwater and conservation goals were removed from the Amendment. The stormwater and conservation goals were in the Policy prior to the adoption of the State Water Board's Strategy to Optimize Resource Management for Stormwater, which includes goals needed for the State to optimize the use of stormwater resources. In addition, in May 2018, the California State Legislature passed SB 606 (Hertzberg) and AB 1668 (Friedman), which, among other requirements, require the State Water Board to adopt regulations for urban water efficiency standards for indoor use, outdoor use, and water lost to leaks by 2022. The legislation also requires urban retail water agencies to calculate and meet their own urban water use objectives by 2023. These regulations are a more appropriate vehicle for conservation targets and reflect current state policy with regard to conservation. See also section 4.2 of the Staff Report with SED. See also response to Comment 2.046.	3. Goals, mandates, and reporting requirements
6.002	How does a particular utility evaluate their progress toward the listed state-wide goal?	Utilities may estimate their contribution to the statewide goal by participating in the tracking and reporting program outlined in section 3.2 of the Amendment. Once these data are available, the State Water Board will analyze and evaluate progress on a statewide level and evaluate the need to refine and revise the goals.	3. Goals, mandates, and reporting requirements
6.003	Section 3.2. We recommend including a line item related to necessary discharge flows to maintain the aquatic environment.	As indicated in section 3.2.3 of the Amendment, when reporting the volume of treated wastewater discharged to inland surface waters, the volume required to maintain minimum instream flow must be specified.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
6.004	Raw water augmentation is listed (page 5), but little difference is made between it and "Reservoir water augmentation". We suggest that some language is used to explain the difference.	The definitions for reservoir water augmentation and raw water augmentation are included in Water Code section 13561. Figure 4-2 in the Staff Report with SED depicts the difference between the two terms. Regulations for reservoir water augmentation in CCR, title 22 provide additional details on which projects would be classified as a reservoir water augmentation project. Regulations for raw water augmentation are under development.	14. Definitions
6.005	Further, "Finished water augmentation" is not listed. We request that Finished water augmentation is also listed and described.	Changes were made to the Definitions section of the Amendment to add a definition for treated drinking water augmentation, as defined in section 116275 of the Health and Safety Code. This term was added, in case regulations for treated drinking water augmentation are adopted prior to the next amendment to the Policy.	14. Definitions
6.006	There are only a few laboratories that are known for bioassay testing, and there is only one that we are aware of that is responsive in California (UC Davis).	Four commercial laboratories have been identified with the capacity for the *in vitro* bioassay testing. Academic laboratories in California (e.g., UC Riverside, UC Davis) and elsewhere have the capability to perform the *in vitro* bioassay testing. The application of bioanalytical screening tools was first suggested by the Panel in 2012 and the technology for ER-α and AhR in vitro bioassays has been used for decades. It is expected that California laboratories will be interested in developing the capacity to conduct *in vitro* bioassay testing as this testing becomes a requirement for screening recycled water used for groundwater recharge or reservoir water augmentation. In addition, the State Water Board is developing a grant agreement that includes reaching out to laboratories and identifying laboratories interested in developing the capacity to run the bioanalytical screening tools and providing them with resources and training.	10. CECs and Attachment A

No.	Comment	Response	Categories
		Section 4.1.2.1 of Attachment A includes a one-year grace period from the time the Amendment becomes effective before monitoring with bioanalytical screening tools is required to commence in the initial assessment phase. This time will allow facilities to procure funds for capital investments if they plan to develop in-house capabilities for monitoring with in vitro bioassays, train staff on the equipment, allow labs to conduct the required method detection limit and reporting limit verification studies, develop quality assurance project plans, and allow commercial laboratories in California to begin offering these analyses.	
7	**Central Valley Clean Water Association** **Commenter: Debbie Webster**		
7.001	As a preliminary matter, CVCWA supports the comments provided by WateReuse California, California Association of Sanitation Agencies, Association of Clean Water Agencies, and California Municipal Utilities Association (referred to hereafter as "WateReuse et al.,"). In an effort to be more efficient, we have not repeated such comments here. However, CVCWA very much agrees with WateReuse et al., and in particular supports their comments regarding the bioassay monitoring provisions for Constituents of Emerging Concern (CECs).	Comment noted. See responses to comments for WateReuse et al., and responses provided below.	10. CECs and Attachment A
7.002	We provide additional comments here that are specific to the Central Valley and CVCWA's member agencies. Our comments pertain specifically to proposed definition for incidental runoff, a new goal regarding minimizing discharges, reporting requirements, the wastewater change petition process, and monitoring requirements for CECs. Our comments are provided in numerical order according to when the issue appears within the Draft Amendment.	This comment is an introductory statement to Comments 7.003 to 7.013.	12. General Comment

No.	Comment	Response	Categories
7.003	**Definitions** The Draft Amendment proposes to include specific definitions for use in the Recycled Water Policy. CVCWA does not disagree with this approach. However, there is one definition in particular that causes CVCWA concern. • *Incidental runoff*. The draft definition appears to be provided in a context that relates specifically to landscape irrigation and does not take into account or reflect that the Draft Amendment applies broadly to both landscape irrigation and agricultural irrigation. When recycled water is used for agricultural irrigation, it should be treated the same as any water source used for agricultural irrigation purposes, which includes the fact that certain agricultural irrigation practices necessitate the need for runoff to protect the crop. As proposed, the definition for incidental runoff includes language that creates a negative connotation associated with purposeful runoff – e.g., "[w]ater leaving a recycled water use area is not considered incidental if it is due to the facility design, excessive application, intentional overflow or application, or negligence." We propose that the definition be modified to indicate that the term "incidental runoff" as defined here applies only to incidental runoff as it relates to landscape irrigation – not agricultural irrigation.	The definition of incidental runoff appropriately applies to both landscape and agricultural irrigation since the definition incorporates exceptions for what is considered incidental runoff that account for agricultural use (e.g., intentional overflow or application, facility design, excessive application, or negligence). Intentional agricultural runoff to protect the crop would be considered intentional overflow or application. Additionally, section 7.5 of the Amendment was revised in to (1) eliminate the requirement that the incidental runoff of recycled water be confined to the use area and (2) to include provisions allowing incidental runoff of recycled water used for irrigation, including agricultural irrigation, as long as the incidental runoff does not result in an exceedance of water quality objectives, or any such exceedance is authorized by a time schedule included in WDRs, a waiver of WDRs, or a conditional prohibition.	14. Definitions

No.	Comment	Response	Categories
7.004	**Goals and Reporting Requirements to Track Recycled Water** CVCWA has several concerns with the goals and reporting requirements expressed in section 3 of the Draft Amendment. A. Sub-Section 3.1.2 First, CVCWA shares the concerns with respect to Goal 3.1.2 as expressed by CASA et al., in their comment letter. While use of recycled water may be a benefit in that it will result in minimizing such discharges, we believe that this statement in sub-section 3.1.2 is an inappropriate goal. Further, minimizing discharges must be feasible and practicable – not just where necessary to maintain beneficial uses. There are many reasons why some agencies are unable to minimize or eliminate direct discharges, including but not limited to infrastructure constraints, seasonal weather constraints, demand for recycled water, and many others. All of these factors must be considered when determining if minimizing direct discharges are feasible and practical. Accordingly, CVCWA requests that paragraph 3.1.2 be deleted, or at the very least, revised to include where it is feasible and practicable to do so.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
7.005	Sub-section 3.2.1 includes significant reporting requirements for municipal wastewater treatment plants. While CVCWA understands the need for and purpose of such reporting, CVCWA is very concerned with the frequency of such reporting. Many of CVCWA's recycled water producers that are also municipal wastewater treatment plants are small and have limited staff. Monthly reporting of the information requested in subsection 3.2.1 is extremely onerous. Rather than requiring monthly reporting, CVCWA	See response to Comment 2.100. The reporting frequency is changed to annual.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	recommends that reporting for this purpose be done on an annual basis, or alternatively, at the most quarterly.		
7.006	**Wastewater Change Petitions** A. Sub-Section 5.1 The Draft Amendment contains some revisions to the State Water Resource Control Board's (State Water Board) review of wastewater change petitions filed pursuant to Water Code section 1211 (Section 1211). First, the Draft Amendment includes a requirement that all proposed water recycling efforts by wastewater treatment agencies consult with the State Water Board in order to obtain a determination of whether a Section 1211 wastewater change petition is required for the project. This new requirement does not reflect current practice and does not assist in streamlining the current system. Instead, this additional step has the potential to increase the administrative burden on the State Water Board, thereby increasing the length of time necessary for publicly-owned treatment works (POTWs) to obtain the necessary approvals to begin recycling water. Regional water boards are well equipped to determine if recycled water projects proposed to them trigger the need for a wastewater change petition, and will inform permittees accordingly. There is no need for the State Water Board's Division of Drinking Water to also make such a determination. Further, this creates a new legal requirement that is not in statute, and is in fact questionable under the law.	The State Water Board has the authority to adopt water quality control policies (see Water Code section 13142 subdivision (c)) to establish requirements to protect water quality. The reason for the determination step is to provide greater assurance that wastewater dischargers are obtaining proper approvals prior to project implementation. Section 5.1 of the Amendment has been modified to allow project proponents to make an evaluation of whether a wastewater change petition is needed and to obtain concurrence from Division of Water Rights. The State Water Board is open to and will consider implementing approaches that will streamline the process, such as improved integration with regional water board and Division of Water Rights review, as well as an optional "self-certification" checklist that would be completed by the discharger in conjunction with obtaining concurrence from the State Water Board. The Division of Water Rights, not DDW, is the division within the State Water Board responsible for processing wastewater change petitions.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
7.007	Moreover, the need for this determination is inapplicable to many recycled water projects that may receive state funding. For instance, many of CVCWA's members currently discharge solely to land, and a requirement to seek a State Water Board determination that their recycled water project would not need a Section 1211 petition adds another step that requires additional resources beyond those already necessary to create a viable recycled water project. Clearly, the answer to this inquiry is fairly obvious and a determination by the Division of Water Rights is unnecessary and a waste of valuable resources. CVCWA requests that the requirement be removed, or at the very least modified to ensure that the need for such a determination be triggered only when there is connection to a surface water course, and not just because there is state funding involved.	See responses to Comments 1.018 and 7.006.	5. 1211 and WW Change Petitions
7.008	Sub-Section 5.3 The Draft Amendment also includes a new provision relating to the consideration of Section 1211 wastewater change petitions: Section 5.3. Specifically, this section provides that the State Water Board may consider potential cumulative impacts to the environment and public trust resources associated with the proposed wastewater change. The Draft Amendment should reflect that the analysis of cumulative impacts is commensurate with the State Water Board's existing review duties under the California Environmental Quality Act (CEQA) both individually and as a responsible agency for such projects. Section 792 of Title 23 of the California Code of Regulations provides that any approvals for change petitions must comply with CEQA. CEQA already requires the consideration of potential cumulative impacts, and thus the State Water Board's compliance with CEQA ensures that cumulative impacts will be	Section 5.3 of the Amendment was modified to incorporate additional clarification of the State Water Board's authority to consider cumulative impacts under its responsible agency role pursuant to CEQA, as well as its overarching authority to weigh project impacts to public trust resources, which falls outside any limitation of CEQA review. (See generally National Audubon Society v. Superior Court (1983) 33 Cal.3d 419 [189 Cal. Rptr. 346, 658 P.2d 709].)	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
	considered. (See Cal. Code Regs., tit. 14, § 15130; see also CEQA Guidelines, Appendix G, ¶ XVII(b).) Accordingly, CVCWA requests that the Proposed Amendments be revised to read as follows: 5.3. Consistent with its responsibilities pursuant to CEQA, the State Water Board may consider potential "cumulatively considerable" (as defined in applicable State Water Board regulations) impacts to the environment and public trust resources caused by the proposed recycled water project and related projects that may reduce stream flows. . .		
7.009	**Permitting and Antidegradation Analysis for Non-Potable Recycled Water Projects** A. Sub-Section 7.2.1 In general, CVCWA appreciates the Draft Amendment and its efforts to drive recycled water permittees to the State's General order, and to streamline permitting for recycled water projects. However, CVCWA believes that current and existing recycled water permittees should have greater flexibility in determining if they want to be covered by the State's General Order, or maintain existing permits for recycled water use. Accordingly, CVCWA recommends that the Draft Amendment be modified by changing the wording in subsection 7.2.1 from "shall" to "should."	No change was made in response to the comment. The Amendment states, "all appropriate and eligible projects with the capability of taking on the responsibility of administrating water recycling programs shall enroll under statewide water reclamation requirements." By limiting this clause to "appropriate" projects, the regional water boards maintain flexibility in choosing the appropriate permit for the project. Recycled water users currently enrolled under a Master Recycling Permit need not enroll under Order WQ 2016-0068-DDW unless the permittee and regional water board decide Order WQ 2016-0068-DDW is the appropriate permitting mechanism.	7. Permitting for Non-potable

No.	Comment	Response	Categories
7.010	Sub-Section 7.4 The Draft Amendment includes a provision for "incidental runoff of recycled water for irrigation." As commented above in Section I, the Draft Amendment does not appear to distinguish between agricultural runoff (that may or may not be incidental), and incidental runoff from landscape irrigation projects. While we appreciate that subsection 7.4 appears to try to address the situation where recycled water is used for agricultural irrigation, the language is unclear as to what is meant by an authorized discharge. Does this mean that there must be authorization for discharge of recycled water used for agricultural irrigation, or that agricultural runoff in general is authorized, including recycled water used for such purposes? Because of the differences between landscape irrigation and agricultural irrigation, CVCWA recommends that sub-section 7.4 be divided into separate provisions for landscape and agricultural irrigation purposes.	Section 7.5 of the Amendment has been revised to state "The incidental runoff of recycled water shall not result in water quality less than that prescribed in water quality control plans or policies, unless authorized through time schedule provisions in waste discharge requirements, waivers of waste discharge requirements, or conditional prohibitions (e.g., agricultural discharges from irrigated lands)." Incidental runoff from use of recycled water for agricultural irrigation therefore does not need a specific authorization, unless its runoff results in water quality less than that in water quality control plans or policies. If time schedule provisions in WDRs, waiver of WDRs, or conditional permits authorize lower quality runoff, the practice is acceptable.	7. Permitting for Non-potable
7.011	While CVCWA finds the materials in Attachment A to be helpful, it can be further refined to reflect the current regulatory landscape for environmental laboratories performing the monitoring analyses. In particular, Section 1.1 requires laboratories performing CEC analyses to have a quality management system that meets certain specified criteria. This section would be more accurately titled "Laboratory Accreditation and Methods."	See response to Comment 1.046.	10. CECs and Attachment A

No.	Comment	Response	Categories
7.012	Additionally, the two options for quality management systems provided in Section 1.1 are highly detailed and focus on the content of regulations that are currently under development in the State Water Board's Environmental Laboratory Accreditation Program (ELAP). For example, Section 1.1.1 specifically refers to The National Environmental Laboratory Accreditation Conference Institute (TNI) 2016 Standard, a standard that is currently being considered as the basis for laboratory management system regulations by ELAP. Because these regulations are still under development, specific reference to this standard is premature, and could potentially conflict with the quality management system regulations ultimately adopted by ELAP and the State Water Board.	See response to Comment 1.046.	10. CECs and Attachment A
7.013	Furthermore, the specifics of laboratory accreditation and quality management systems are best established in separate regulations, and can simply be referred to in the Recycled Water Policy. CVCWA requests that all subsections of section 1.1, including sections 1.1.1 and 1.1.2, be removed from Attachment A to the Draft Amendment, and that section 1.1 be revised to read: The recycled water project proponent or recycled water producer shall confirm and be able to produce documentation that all analyses of samples are performed by California-accredited laboratories. Analytical methods used for monitoring shall be fully vetted prior to use and certified as applicable. ~~a laboratory used to perform analysis of CECs required under this Policy has a laboratory quality management system in place that meets the requirements described in 1.1.1 or 1.1.2 below. The requirements in 1.1.1 and 1.1.2 describe equivalent quality management systems. The recycled water project proponent or recycled water producer shall make such~~	See responses to Comments 1.046 and 1.049.	10. CECs and Attachment A

No.	Comment	Response	Categories
	~~documentation available if requested by the State Water Board or regional water board. A laboratory must comply with the requirements of either 1.1.1 or 1.1.2~~		
8	**City of Los Angeles Bureau of Sanitation** **Commenter: Enrique Zaldivar**		
8.001	The City of Los Angeles (City) Bureau of Sanitation (LASAN) appreciates the opportunity to provide comments and recommendations on the State Water Resources Control Board's (State Water Board) Proposed Amendment to the Recycled Water Policy (RWP). This letter incorporates by reference the comments submitted by WateReuse California and the California Association of Sanitation Agencies. Recycled water is a resource that preserves potable water supplies and can help to reduce the State's consumption of energy and resulting greenhouse gas emissions associated with supplying potable water throughout the State. The City is committed to the use of recycled water for irrigation and all other potable and non-potable purposes and is ambitious is reaching its goals of reducing the City's per capita potable water use by 25% in 2015 and reduce the purchase of imported water by 50% in 2024. The City continues to expand its recycled water program and in FY '16 - '17 the City recycled and reused 136,000 acre-feet per year (AFY) reducing the City's potable demand by 8,030 AFY.	Comment noted. No change is requested.	12. General Comment

No.	Comment	Response	Categories
8.002	LASAN commends the State Water Board in its efforts to encourage water recycling through the development of a streamlined policy driven by stakeholder input and the most current scientific information to date. LASAN appreciates a number of positive changes included in the proposed RWP; specifically, it 1) removes water recycling mandates and replaces them with goals; 2) affirms that Constituents of Emerging Concern (CEC) monitoring is not required for landscape irrigation projects; 3) only requires Salt and Nutrient Management Plans, if needed; 4) terminates coverage under Regional Water Quality Control Board General Orders for non-potable uses for transfer to Order WQ 2016-0068-DDW (Water Recycling Requirements); 5) follows the scientific framework and risk-based phased approach recommended by the Science Advisory Panel's (Panel) Final Report, *"Monitoring Strategies for Constituents of Emerging Concern (CECs) in Recycled Water: Recommendations of a Science Advisory Panel (CEC Report)."*	Comment noted. The commenter is listing specific Amendment language that they support.	12. General Comment
8.003	LASAN encourages the State Water Board to adopt the recommendations of the Panel's CEC Report into the RWP without modification. The recommendations in the Panel's report represent the "best available science" on the potential health effects of CECs. Relying on the Panel's expertise is the best way to ensure a safe and reliable supply of recycled water that complies with all recycled water use requirements allowed under Title 22. Any deviation from the Panel's recommendations may inadvertently result in unnecessarily diverting scarce public resources with little environmental benefit.	Section 10.2 of the Amendment includes the provisions related to convening the Scientific Advisory Panel including their role in making scientifically-based recommendations for actions that the State should take to improve our understanding of CECs. The State Water Board reviewed the recommendations and incorporated them in the May 9, 2018 draft Amendment, which included some policy decisions. We considered feedback from the public comment periods and revised Attachment A and section 4.14 of the Staff Report with SED to align with the Panel's recommendation from the 2018 report. Here is a summary of the revisions that were made to address the differences between May 9, 2018 draft and the Panel's report: • The initial assessment monitoring phase is now for gathering data using the bioanalytical screening tools in	10. CECs and Attachment A

No.	Comment	Response	Categories
		Table 3 and no response actions are required during this phase. • The initial assessment phase is now three years and the baseline assessment phase is now one year for bioanalytical screening tools. • The assessment of the monitoring data and pilot testing of applying the assessment framework and response actions begins in the baseline assessment phase. • Add the discussion of convening the Bioanalytical Advisory Group in section 4.14.2 of the Staff Report with SED The concerns raised by the commenter are addressed in the specific comments below.	
8.004	Consistent streamlined requirements are essential to encourage the development of new water recycling projects so that the State Water Board can achieve its new goal of increasing the use of recycled water from 714,000 AFY in 2015 to 1.5 million AFY by 2020 and to 2.5 million AFY by 2030. Recycled water provides a consistent supply of high quality water that reduces potable water demand and is drought resistant. Both the California Constitution and Water Code require maximizing the beneficial use of this valuable resource.	See response to Comment 2.006.	12. General Comment
8.005	The City hopes that the detailed comments proposed in Attachment A will assist the State Water Board in revising its latest draft of the proposed RWP and looks forward to working with them in developing a RWP that encourages water recycling and the use of this valuable resource throughout the state.	Comment noted. See responses to Comments 8.012 to 8.033, 8.043, and 8.044.	12. General Comment

No.	Comment	Response	Categories
8.006	LASAN supports the State Water Board in replacing the mandate found in the previous RWP (to increase the use of recycled water by 200,000 AFY by 2020 and by an additional 300,000 AFY by 2030) with the goal to encourage the increased use of recycled water (to increase the use of recycled water from 714,000 acre-feet per year (AFY) in 2015 to 1.5 million AFY by 2020 and to 2.5 million AFY by 2030).	Section 3.1.1 of the Amendment maintains the recycled water goal in the Policy and deletes the mandates.	3. Goals, mandates, and reporting requirements
8.007	The RWP adds another goal: *3.1.2. Minimize the direct discharge of treated municipal wastewater to enclosed bays, estuaries and coastal lagoons, and ocean waters, except where necessary to maintain beneficial uses. For the purpose of this goal, treated municipal wastewater does not include brine discharges from recycled water facilities or desalination facilities.* LASAN does not support the inclusion of this goal. This should not be a goal in and of itself because the need for recycled water and the ability to recycle water is not coastal specific. It is not appropriate to incorporate a goal only applicable to coastal discharges to the entire state. The intent of the RWP is to streamline water recycling for successful water recycling in California.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
8.008	Discharge volume and water conservation issues of ocean/bay discharges and water quality impacts to these water bodies should be left with the Regional Boards and their National Pollution Discharge Elimination System's or waste discharge permit requirements.	The narrative goal is specific to increasing recycled water use and does not supersede, conflict, or add provisions related to water quality or conservation to existing regional water board issued NPDES permits or WDRs. Water Code section 13142 authorizes the State Water Board to adopt state policy for water quality control that may include principles and guidelines for long-range resource planning, including surface water management programs and control and use of recycled water.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
8.009	Creating a goal for coastal ocean dischargers, many of which currently employ only secondary treatment, should only be a goal if it is reasonable, cost effective, feasible, and applicable. Without consideration of cost-effectiveness, feasibility, or recycled water use needs in the new RWP goal language, the State Water Board's goal could soon become a future unfunded mandate.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
8.010	What is reasonable in one situation, coast, or region changes over time as future economic, climate, and water conservation conditions are uncertain and always changing. LASAN requests that the goal to minimize the direct discharge of treated municipal wastewater to enclosed bays, estuaries, coastal lagoons, and ocean waters be removed from the RWP.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
8.011	If the State Board decides to keep the goal, LASAN requests the following language be substituted: *3.1.2. Maximize the use of treated municipal wastewater from coastal municipal water reclamation plants that discharge to enclosed bays. estuaries. coastal lagoons. and ocean waters if it is reasonable within that coastal region and it makes financial sense. For the purpose of this goal, treated municipal wastewater does not include brine discharges from recycled water facilities or desalination facilities.*	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
8.012	LASAN supports all the recommendations found in the Science Advisory Panel's (Panel) Final Report, "Monitoring Strategies for Constituents of Emerging Concern (CECs) in Recycled Water (CEC Report)."	Comment noted. This comment is a statement of support and no response is needed. Also see revisions to section 4.14 of the Staff Report with SED.	10. CECs and Attachment A

No.	Comment	Response	Categories
8.013	LASAN continues to support the incorporation of bioanalytical screening methods into CEC monitoring programs and the investment in research to expand the bioscreening toolbox.	Comment noted. This comment is a statement and no response is needed.	10. CECs and Attachment A
8.014	LASAN supports the tiered, "adaptive management " strategy that minimizes regulatory restrictions by utilizing bioanalytical methods as a screening tool in conjunction with chemical analysis to identify whether chemicals missed by targeted monitoring are potentially problematic.	Comment noted. This comment is a statement and no response is needed.	10. CECs and Attachment A
8.015	LASAN supports the risk-based framework, bioanalytical screening methods, phased approach, and flexibility for CEC monitoring recommended by the Panel in their CEC Report.	Comment noted. This comment is a statement of support and no response is needed. Also see revisions to the Phased Monitoring Requirements in section 4 of Attachment A, the data evaluation and response actions in section 5 of Attachment A, and section 4.14 of the Staff Report with SED.	10. CECs and Attachment A
8.016	LASAN also supports the formation of a "Bioscreening Implementation Advisory Group" composed of the State Water Board, bioassay experts, municipalities, and other stakeholders recommended by the Panel in the CEC Report. CEC bioassay monitoring is new and has several technical concerns.	The State Water Board intends to work with recycled water stakeholders to convene the Bioanalytical Advisory Group to guide permittees in implementing the bioanalytical screening monitoring requirements in Attachment A. Additional discussion can be found in the newly added section Bioanalytical Advisory Group and Next Steps in section 4.14.2 in the Staff Report with SED.	10. CECs and Attachment A
8.017	A Bioscreening Implementation Advisory Group is necessary to guide water recyclers through implementation of CEC monitoring and data collection; to define goals for bioanalytical monitoring specify protocols for sampling, extraction, measurement, and data reporting; and to provide guidance for interpreting bioanalytical monitoring results, including QA/QC data.	See response to Comment 8.016.	10. CECs and Attachment A

No.	Comment	Response	Categories
8.018	While LASAN supports the Panel's recommendations in the CEC Report, the RWP deviates from the Panel' s recommendations by requiring premature response actions for methods that are not yet "fully validated and certified by the appropriate entities."	The phased monitoring approach and response actions for the health-based and performance indicator CECs is consistent with the Policy and the recommendations for the 2018 Science Advisory Panel. The Policy had minimal quality assurance provisions and the Amendment significantly expands on this area (see section 1 of Attachment A) to ensure the monitoring data are reliable and repeatable. The recycled water producer will be required to have the samples analyzed using analytical methods that have been validated and approved for the CEC Parameters in Attachment A and prior to sampling and generating data. The recycled water producer must also use laboratories that have demonstrated competency in conducting the approved analytical methods for the CEC Parameters in Attachment A. These details will be described in the QAPP, which must be approved by the regional water board or State Water Board. The phased monitoring approach and response actions for the bioanalytical screening tools is now is consistent with the recommendations for the 2018 Science Advisory Panel, with the exception the State Water Board included a monitoring trigger level for AhR that is policy-based and not health-based. However, aligning with the Panel's recommendation resulted in an overall increase in the cost of monitoring for the first four years of the phased monitoring. The cost of kits went from $57,500 to $68,000 and the laboratory services increased from $47,500 to $76,000 (see Table 4-6 in the Staff Report with SED). However, this cost analysis did not factor in potential cost savings from not having to implement the response actions. Further discussion can be found in the Phased Monitoring	10. CECs and Attachment A

No.	Comment	Response	Categories
		and Data Evaluations subsection in section 4.14.2 of the Staff Report with SED. See responses to Comments 1.046 and 1.049 regarding method validation and laboratory selection.	
8.019	The RWP requires immediate resampling and analysis if the BEQ/MTL ratio is >10 and additional actions including, but not limited to, targeted analytical monitoring, higher frequency, and source identification. If the BEQ/MTL ratio is > 1000, additional actions include, but are not limited to, toxicological studies, engineering removal studies, non-targeted analysis, modification of facility operations, and monitoring multiple locations.	Tables 8 and 10. in Attachment A were revised so rather than immediate resampling, the response is to check the data and re-sample within 72 hours to confirm the bioassay result. Also see response to Comment 8.018 regarding the response actions.	10. CECs and Attachment A
8.020	The Panel' s CEC Report states the following: *" While the Panel has outlined a process to interpret and respond to in vitro bioassay results, this process is not sufficiently mature to justify response actions at this time. Thus, the Panel recommends a phased implementation of bioanalytical screening, with Phase I consisting of a three to five-year data collection period, with no response actions required during this time (viii)."* *"The Panel recognizes the need for a robust interpretive framework for bioanalytical monitoring results and has proposed a framework to establish monitoring trigger levels and appropriate response actions. However, the Panel feels that requiring response actions during Phase I data collection is premature (p. 82). "* As interpretive guidance for bioscreening data is not yet mature and studies are not yet complete, response	Section 7.4 of the Panel Report states, *"The Panel recommends a phased approach for implementation of bioanalytical monitoring of recycled water. Phase I is a data collection exercise to determine the range of responses for IVBs standardized for water quality monitoring (i.e. Stage 3 of higher in Table 7.2) and that represent endpoints relevant to human health in designated samples from recycled water facilities across the state. Phase II is a pilot evaluation of the interpretive framework for bioanalytical monitoring results (described in section 7.3), with initial MTLs established to further guide appropriate response actions geared toward ensuring a high quality of recycled water. Phase III would constitute full implementation of bioanalytical monitoring, where validated and certified bioanalytical methods would*	10. CECs and Attachment A

No.	Comment	Response	Categories
	actions, such as identification of bioactive chemicals, are encouraged, but should not be required during the data collection or pilot phases. CEC monitoring for water reuse requires a dynamic process that must take into account new chemicals coming into commerce, better treatment methods to tailor water quality to various reuse applications, new water reuse practices, and constantly changing and more sensitive analytical tools (both chemical and bioanalytical), with the overall goal of assuring that public health is protected.	*be an integral component of routine screening/monitoring of recycled water quality."* The Amendment was revised to mirror the Panel's phased implementation of the bioanalytical screening tools so that no response actions are required during the initial assessment phase for the bioanalytical screening tools. The response actions are not required until the baseline monitoring phase. We would like to reiterate that the response actions for bioanalytical screening tools are for investigatory purposes. If the BEQ/MTL ratio is between 10 and 1000, or above 1000, the response actions are intended for a recycled water producer to first confirm that the bioactivity is there, and then consult with the Water Boards to identify appropriate investigatory response actions to identify the source of the bioactivity. Further discussion can be found in the Phased Monitoring and Data Evaluations subsection in section 4.14.2 of the Staff Report with SED. Also, see response to Comment 8.018.	
8.021	LASAN recommends that the State Water Board follow the recommendations of the Panel that specifically states that regulatory response actions are premature and not advised until additional data collection, research, and pilot projects can be performed.	See responses to Comments 8.018 and 8.020.	10. CECs and Attachment A
8.022	The State Water Board is currently funding a study with Water Research Foundation that involves standardizing and validation of bioanalytical tools for recycled water. This study should help inform the process. Response actions are premature until the study is complete. The flexibility to remove or add new CECs to the monitoring list and to wait until data and	The Amendment includes a one-year grace period after the effective date of the Amendment and the initial assessment phase is three years long. The State Water Board is developing a grant agreement with SCCWRP in collaboration with the Water Research Foundation to build consensus on optimized analytical methods and standard operating procedures, build capacity for more laboratories to conduct the analyses, develop guidance on data	10. CECs and Attachment A

No.	Comment	Response	Categories
	scientific studies are complete is crucial in achieving cost effective, meaningful data to guide future policy.	interpretation, and develop additional bioanalytical screening endpoints. The results from the grant agreement will assist the utilities in implementation and we anticipate the results will be available within a few years of initiating the grant agreement. The timing of the results may only be an issue for recycled water treatment plants that intend to use existing data to meet the initial assessment monitoring phase and begin the baseline monitoring phase. However, the ER-α and AhR bioanalytical screening tools have been sufficiently developed and are capable of generating reliable, repeatable data if appropriate quality assurance measures are implemented. This emphasizes the importance of developing and implementing the QAPP (section 1 of Attachment A). But if a recycled water treatment plan has three years of assessment data using ER-α and AhR, then they likely have enough data to submit the necessary information for the QAPP and could begin implementing the response actions in the baseline assessment phase.	
8.023	LASAN recommends the State Water Board remove from the RWP all response actions during Phase 1 (3-5 year data gathering stage) and Phase 2 (1-year pilot evaluation of bioassay framework). LASAN believes that response actions should only be included during Phase 3 (full implementation phase) as applicable.	See responses to Comments 8.018 and 8.020.	10. CECs and Attachment A
8.024	The RWP should also support the formation of the "Bioscreening Implementation Advisory Group," as recommended by the Panel in the CEC Report.	See response to Comment 8.016.	10. CECs and Attachment A

No.	Comment	Response	Categories
8.025	**<u>Laboratory Standardization, Validation, and QA/QC of Bioassay Methods for Recycled Water</u>** The Panel's CEC Report defines standardization as "the ability of a bioassay to conform to measurement standards for a recycled water sample, such that they provide utilities and regulators confidence in the comparability of results for recycled water." Validation of a standardized method is the next step in the process of method development and application, which typically entails additional exercises meant to provide a high level of confidence in terms of data accuracy and comparability.	The development and implementation of the QAPP in section 1 of Attachment A will "provide a high level of confidence in terms of data accuracy and comparability." Also see response to Comments 1.046 and 1.049.	10. CECs and Attachment A
8.026	CEC bioassay monitoring is new. Technical concerns, limited availability of labs that use similar approaches/methodologies, and the lack of uniform standardization and validation procedures make method consistency challenging and the resulting data costly and possibly meaningless. While standardization of bioassays is possible and has been achieved for multiple endpoints, the commercial availability of test products (bioassay kits) and commercial service labs that offer bioanalytical testing for matrices of interest to the recycled water community remains limited and small. There are only four bioassay labs listed in the Panel's CEC Report (Indigo Biosciences, IonTox, Attagen, and BDS), only three of which are in the United States, and they all utilize different methodologies and approaches.	See responses to Comments 1.046 and 1.049 regarding ensuring data quality for the bioanalytical screening tools. See response to Comment 6.006 regarding the number of laboratories capable of conducting the ER-α and AhR bioassays.	10. CECs and Attachment A

No.	Comment	Response	Categories
8.027	RWP Attachment A Section 1.1.1 requires labs to "comply with the management and technical requirements applicable to their operations in accordance with The National Environmental Laboratory Accreditation Conference Institute (TNI) 2016 Standard Volume 1..." At this moment, SWRCB's Environmental Laboratory Accreditation Program (ELAP) is considering implementing TNI standards. This rule should be applicable only after ELAP has adopted the TNI Standards.	Section 1.1.1 of Attachment A was removed and replaced. See section 1 of Attachment A. Also, see response to Comment 1.046.	10. CECs and Attachment A
8.028	RWP Attachment A Section 1.2.1 requires that a laboratory providing analysis of CECs shall be accredited by ELAP. CECs are analyzed using different methods, and ELAP or a functional equivalent must be available to certify all CEC methods.	Section 1.2.1 of Attachment A was removed and replaced. See section 1 of Attachment A and section 4.14.4 for a discussion on Quality Assurance Project Plans, including the use of ELAP accredited laboratories when available. Also, see response to Comments 1.046 and 1.049.	10. CECs and Attachment A
8.029	RWP Attachment A Section 1.3.2 requires that a laboratory submit Method Detection Limit (MDL) studies and Reporting Limit (RL) verification data to the State Water Board for review and approval prior to beginning any sampling and analysis to ensure that the data meets the required RLs in Table 3.	Section 1.2.1 of Attachment A was removed and replaced. See section 1 of Attachment A and section 4.14.4 for a discussion on Quality Assurance Project Plans, including selection of analytical methods and method validation and approval.	10. CECs and Attachment A
8.030	Recycled water producers should not be responsible to maintain a laboratory's Quality Control (QC) documentation; laboratory oversight is a requirement meant for validating labs such as ELAP.	The recycled water producer is not required to maintain a laboratory's QA/QC documentation unless the recycled water producer is operating that laboratory. If the recycled water producer has their samples analyzed by an external laboratory, then the recycled water producer should receive all appropriate documentation from the laboratory to meet the requirements in the QAPP. This is standard practice for the client (recycled water producer) to request documentation from the laboratory providing the services that the lab produces reliable, repeatable, accurate and precise data that will meet the needs of the client (e.g., reporting limits, data quality objectives). Also, see response	10. CECs and Attachment A

No.	Comment	Response	Categories
		to Comment 1.046 regarding ELAP accreditation of laboratories.	
8.031	LASAN recommends that the Bioscreening Implementation Advisory Group review alternative certifications currently held by laboratories to determine their sufficiency and to ensure laboratories submit necessary and sufficient information regarding RLs and MDLs.	WateReuse has developed a scope of work for the Bioanalytical Advisory Group. The State Water Board will participate in the process of the Bioanalytical Advisory Group, but we suggest contacting WateReuse for any suggestions regarding the scope and charge of the Bioanalytical Advisory Group.	10. CECs and Attachment A
8.032	The Panel's CEC Report describes a planned State Water Board and Water Research Foundation study on "Standardizing Bioanalytical Tools... for Recycled Water" which is planned to begin in mid-2018.	Comment noted. The State Water Board anticipated initiating the referenced study in early 2019. See the *Bioanalytical Advisory Group and Next Steps* in section 4.14.2 of the Staff Report with SED and response to Comments 8.016 and 8.022.	10. CECs and Attachment A
8.033	LASAN recommends that the Bioscreening Implementation Advisory Group become involved with this study to investigate inter-laboratory methodological differences and to develop standardized consistent approaches to Bioassay monitoring.	See response to Comment 8.031.	10. CECs and Attachment A
8.034	**<u>Wastewater 1211 Change Petitions</u>** Water Code section 1211 requires the following: (1) the owner of any wastewater treatment plant obtain the approval of the State Water Board before making any change in the point of discharge, place of use, or purpose of use of treated wastewater where changes to the discharge or use of treated wastewater have the potential to decrease the flow in any portion of a watercourse. In order to approve the proposed change, the State Water Board must determine that the proposed change will not operate to the injury of any legal user of the water involved (California Water Code [CWC] §1702), and the State Water Board also has an	Comment noted. This comment is stating the Water Code section 1211 requirements and uses this discussion to lead into Comment 8.035, which raises concern that the Amendment language goes above and beyond Water Code section 1211 requirements. See response to Comment 8.035.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
	independent obligation to consider the effect of the proposed change on public trust resources and beneficial uses established for areas downstream of the discharge point, and to protect those resources where feasible. (National Audubon Society v. Superior Court (1983) 33 Cal.3d 419 [189 Cal. Rptr. 346].) The State Water Board is required to review the 1211 petition for impacts to other water users (the "no injury" rule), impacts to the environment (no unreasonable impacts on fish and wildlife), and whether granting the petition in the public interest.		
8.035	The changes in the RWP go above and beyond CWC 1211 and create uncertainty rather than clarity and otherwise provide for an unnecessary, duplicative process.	See response to Comment 7.008. The Amendment is restating existing State Water Board authority under Water Code section 1211. The Amendment is intended to provide greater certainty to wastewater dischargers as to whether a wastewater change petition approval is required prior to project implementation and to highlight existing State Water Board authority and the need to balance the beneficial uses of discharges to watercourses.	5. 1211 and WW Change Petitions
8.036	RWP Section 5.1 adds a new requirement that prior to receiving state funding for a recycled water project, a "determination" from DWR must be made that the project is in compliance with Section 1211. RWP Section 5.3 states that the Division of Water Rights (DWR) may cumulatively consider the impacts from "past present and probable future projects with the potential to decrease the stream flow."	To be eligible for state and federal funds, recycled water projects must be in compliance with local, state, and federal laws and regulations, including Water Code section 1211. This is not a new requirement. Also see responses to Comments 1.021, 8.035, and 8.037.	5. 1211 and WW Change Petitions
8.037	LASAN supports a collaborative stakeholder-driven approach in determining ideal stream flows and the most appropriate beneficial uses for recycled water; however, allowing the State Water Board to consider cumulative impacts is duplicative and not necessary to be included in the RWP. CEQA-compliant projects will already have considered the cumulative impacts of	State Water Board currently has the authority to evaluate cumulative affects to stream flow under both CEQA and public trust authority. It may not be necessary for State Water Board to complete additional evaluations in cases where an appropriate environmental analysis has been completed by the wastewater dischargers and public trust	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
	past and present projects, and it is unclear how the agency or the State Water Board can be expected to evaluate "probable future projects" reliably.	resource impacts, if any, are appropriately mitigated. See also response to Comment 7.008.	
8.038	The goal during the RWP scoping process was to streamline the 1211 process; however, the RWP does not streamline the process and has the potential to complicate review for majority of projects. The RWP requires a new 1211 for every project, despite applicant's belief that the change is not reducing flow into the watercourse.	Section 5.1 of the Amendment has been modified to allow the project proponents to make an evaluation of whether a wastewater change petition is needed and to obtain concurrence from Division of Water Rights. The State Water Board is open to and will consider implementing approaches that will streamline the process, such as improved integration with regional water board and Division of Water Rights review, as well as an optional “self-certification” checklist that would be completed by the discharger in conjunction with obtaining concurrence from the State Water Board. See response to Comment 1.018 for additional examples of cases when wastewater change petitions are required.	5. 1211 and WW Change Petitions
8.039	The **RWP** also represents a huge challenge for the State Water Board and water recycling stakeholders who are trying to increase water recycling while maximizing the beneficial use of recycled water. This is a duplicative requirement.	This is not a duplicative requirement, but rather an essential aspect of water resources management to ensure limited resources are being properly balanced to meet instream flow needs while maximizing potential reuse opportunities. Section 5 of the Amendment restates existing State Water Board statutory authority in ensuring watercourses are adequately protected in cases where projects are proposed to reduce flows.	5. 1211 and WW Change Petitions
8.040	LASAN recommends that the State Water Board scale back the language in the RWP to exactly express what 1211 says including CEQA and any cumulative impact requirement analysis.	See response to Comment 7.008. The Amendment is consistent with Water Code section 1211 and is intended to ensure project proponents identify, during the early stages of the planning process, if a wastewater change petition is required. The Amendment also emphasizes the need to balance increased recycled water use with ensuring instream beneficial uses are protected.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
8.041	LASAN also recommends the formation of a stakeholder-driven 1211 advisory group to determine the best uses of recycled water.	The "best uses" of existing wastewater dischargers is a complex matter and will depend in part on watershed-specific circumstances. See also the response to Comment 8.038, regarding engaging with stakeholders to streamline the wastewater petition process.	5. 1211 and WW Change Petitions
8.042	**Reporting Requirements** The draft Policy also requires that agencies report how much wastewater they are discharging to the ocean and bays. LASAN fully supports this requirement, but recommends the monitoring/recording frequency be monthly with an annual reporting frequency.	See response to Comment 2.100. The reporting frequency is changed to require annual reporting of monthly data.	3. Goals, mandates, and reporting requirements
8.043	**Conservative Safety Factor** LASAN appreciates the Panel recognizing that there is no evidence to date that has linked recycled water produced for potable and non-potable reuse to adverse human health effects. The Panel's CEC Report clearly points to the safety of potable and non-potable reuse in California. Explicit and implicit conservative safety factors result in an overall margin of safety of at least 1,000-fold and perhaps exceeding 1,000,000-fold for the average person and an overall margin of safety is likely to be at least 10 to 100-fold for relatively highly exposed individuals. The Panel appreciates that there may exist people with one or more exposure characteristics that could lead to higher exposures than assumed by the CEC screening process for that characteristic (e.g., water consumption rate, body weight). Coupled with the large margin of safety inherent in the risk-based screening framework utilized by the Panel, MEC/MTL screening results indicates that it is very unlikely that any of the RWPs have the potential to pose a risk to public health.	Comment noted, also see response to Comment 8.044.	10. CECs and Attachment A

No.	Comment	Response	Categories
8.044	LASAN supports the Panel's recommendation to establish a formal process to help identify and incorporate new information on the occurrence and toxicity of potentially relevant RWPs in recycled water and believes the RWP should include a public education component to inform the public of the very large margin of safety built into each step of the overall human health CEC screening process.	The Recycled Water Policy Amendment includes Section 2.1 (Benefits of recycled water), which states: "When used in compliance with this Policy, California Code of Regulations, title 22 and all applicable state and federal water quality laws, the State Water Board finds that recycled water is safe for approved uses, and strongly supports recycled water as a safe alternative to fresh water or potable water for such approved uses.." The Panel Report and Staff Report with SED echo the margin of safety built in to the assessment. All the documents are posted for the public and have considered public comments. The State Water Board supports and encourages public outreach. Public education regarding the safety of recycled water is important on the local level where projects are proposed and should be built in to the overall project cost.	10. CECs and Attachment A
8.045	**Termination of Coverage under RWOCB General Orders for Non-Potable Uses to Maximize Consistency in Permitting Related Water Projects** While LASAN supports the termination of coverage under RWQCB General Orders for nonpotable uses for transfer to Order WQ 2016-0068-DDW (WRR), the mandatory nature of the transition and the time frame of **1** year are too restrictive.	See responses to Comments 1.009 and 1.010. Changes to the transition period and termination coverage was made in response to comments.	11. Permit review and update

No.	Comment	Response	Categories
8.046	LASAN supports the transfer of General Orders for non-potable uses to the WRR; however, producers of recycled water should be allowed to opt-into the WRR and there should be no timeline for this option. Water recycling facilities currently operating under existing WDRs and who are in full compliance with all applicable regulations, plans, and policies should be allowed to continue coverage under their existing WDR.	See response to Comment 7.009. Section 11.3.2 of the Amendment was modified to clarify what the regional water board permit review will entail. Regional water boards may continue to use MRPs or individual orders as long as they are in compliance with existing recycled water requirements for the protection of public health and water quality. The Amendment does not mandate the transition to Order WQ 2016-0068-DDW. Regional water boards maintain their authority to choose the most appropriate permitting mechanism for each project. Additionally, prescribing a timeline to transition enrollees from regional water board general orders is important in ensuring all enrollees are consistent with existing state and federal regulations. Section 11.2 of the Amendment is specific to regional water board general orders for non-potable uses and does not affect master reclamation permits or other individual orders, such as individual WDRs or water reclamation requirements.	11. Permit review and update
9	**City of Petaluma** **Commenter: Dan St. John**		
9.001	**1. We recommend changes to the Definitions section of the Amendment.** Tidally influence streams should be differentiated from those that have potential MUN use.	See response to Comment 1.050.	14. Definitions
9.002	The definition for "Estuaries and coastal lagoons" should consider sloughs subject to tidal influence.	See response to Comment 1.051.	14. Definitions

No.	Comment	Response	Categories
9.003	**2. Our primary comments relate to Section 5 of the Proposed Amendment.** Section 5 addresses wastewater change petitions that may be required pursuant to Water Code Section 1211 if a recycled water project results in reduced stream flows. Most recycled water projects, certainly where the Producer is also regulated by an NPDES permit, will by definition result in a reduced volume of discharge to a receiving water body. To encourage the expansion of recycled water, wastewater change petitions for recycled water projects should not be required under most circumstances, and the review of petitions should be streamlined and expedited. The Proposed Amendments should be revised to clarify that not "every" project triggers a full 1211 analysis. Specifically, the City recommends that the Proposed Amendment include the following:	See response to Comment 1.018.	5. 1211 and WW Change Petitions
9.004	There should be language about *de minimis* changes that can be exempted from wastewater change petitions. This may include recycled water projects that decrease discharges to tidal sloughs or projects that decrease discharges below a certain threshold (such as 10%).	See response to Comment 1.020.	5. 1211 and WW Change Petitions
9.005	Division of Water Rights should improve coordination with the State Water Board's Division of Financial Assistance and other funding agencies, who already review the information required in wastewater change petitions as part of CEQA review or other permitting.	See response to Comment 1.021.	5. 1211 and WW Change Petitions
9.006	There should be a streamlined review process for projects that reduce flows to streams or waterways where there is no downstream legal user, and projects where there has already been review of the downstream impacts of the wastewater treatment facility and recycled water program. The streamlined review should consider previous CEQA or other	See response to Comment 1.022.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
	environmental review that evaluated impacts on instream uses at discharge rates that incorporate expected expansions of a facility's recycled water program.		
9.007	The State Water Board or Regional Board should identify streams where a wastewater change petition is not required or should be expedited for recycled water projects. These may include streams with no downstream beneficial use that would be detrimentally impacted (such as tidal sloughs), or streams where the recycled water project proponent is the only permitted discharger.	See response to Comment 1.023.	5. 1211 and WW Change Petitions
9.008	**3. In addition to these comments, the City supports and echoes the comments addressed by the Bay Area Clean Water Agencies (BACWA).**	Comment noted.	5. 1211 and WW Change Petitions
9.009	To demonstrate the significance of the processing of wastewater change petitions, it is useful to describe the City's experience in this issue. The City's Ellis Creek Water Recycling Facility (NPDES Discharge Permit No. CA 0037810; Order No. R2-2016-0014) began service in 2009, and replaced the original 70 year-old wastewater treatment facility. The Ellis Creek facility has a permitted capacity of 6.7 million gallons per day (MGD) average dry weather flow (ADWF) and up to 36 MGD during peak wet weather flow conditions. The facility discharges to the Petaluma River, a tidal slough for most of its length that is connected to San Pablo Bay. Discharge is prohibited during the summer months (May 1 through October 20), unless the facility's effluent flow will exceed the capacity of the recycled water distribution and storage system to meet recycled water demand. In 2017, the City treated 2,192.53 million gallons of wastewater, with ADWF of approximately 4.5 MGD.	The State Water Board is open to working with stakeholder groups to discuss concerns related to specific projects and to identify practical ways to streamline the wastewater change petition process.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
	The City's recycled water system is permitted by the San Francisco Bay Regional Board under General Water Reuse Order No. 96-011. The tertiary recycled water system has a current capacity of 4.68 MGD. In 2017, during the non-discharge season, Petaluma distributed 430 million gallons of tertiary recycled water for irrigating over 1,200 acres of agriculture and urban landscape. In addition, the Ellis Creek Water Recycling Facility utilized 120 million gallons of the tertiary treated effluent for process water and on-site irrigation. Recycled water uses represent 26% of the total wastewater treated in 2017. In 2016, the City was pursuing Proposition 1 funding from the State Water Board for an extension of our urban recycled water distribution system. The City proposed to reduce wastewater discharges by 32 million gallons per year (98.9 acre-feet per year), which is less than 3% of the City's total effluent discharge to the Petaluma River. The City consulted in advance with the Division of Water Rights on the need for a wastewater change petition for a minor reduction in discharge. The City noted that it had analyzed downstream impacts on species in the 2002 Environmental Impact Report (EIR) for the City's wastewater treatment plant. In addition, the EIRs for the Water Recycling program and the City's General Plan considered growth in City. The EIRs did not identify any impacts that had not already been addressed. The California Environmental Quality Act (CEQA) requires that projects not be evaluated in isolation; the increase in discharges as growth occurs must be considered simultaneously with the decreases in discharges due to increased recycled water and conservation. The City's analysis showed		

No.	Comment	Response	Categories
	that there is actually a net increase in discharge over the planning horizon. Despite the minor reduction in discharge, Division of Water Rights determined that a wastewater change petition was required. After submission of the application in August 2016, the processing of the wastewater change petition took over six months. It was City's intent to provide everything necessary to allow smooth and timely review by Water Rights. After submittal, Water Rights' review was protracted and piecemeal with no clear idea what analysis was required to complete the review nor when the review would be complete. If the City's experience is an example of normal processing for a minor change in discharge for a recycled water program that had already been fully evaluated under CEQA and by Fish & Wildlife, we anticipate that expansion of the review to every project that results in a decrease to discharges to streams will cause multi-year delays for recycled water projects.		
9.010	The City is willing to provide more detail of its experience with the wastewater change petition process, and to recommend specific changes in the process to streamline recycled water projects.	See response to Comment 8.038.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
10	**The City of San Diego** **Commenter: Hooman Partow**		
10.001	The City of San Diego (City) appreciates the opportunity to provide public comments on the proposed draft amendments to the state Policy for Water Quality Control for Recycled Water ('Policy'). The City currently operates facilities capable of producing 45 million gallons per day of Title 22 recycled water, and is also in the process of implementing the Pure Water San Diego program, which when fully implemented in 2035 will serve approximately one third of the City's water needs through high-quality, advanced treated potable reuse water. In arid and populated areas like Southern California, water recycling is a critical tool to ensuring we are able to sustainably meet our water needs, both now and in the future. The Recycled Water Policy should be structured so as to wholly support the expansion of safe, cost effective water recycling projects throughout the state, and ensure that both water providers as well as all Californians are stewards of this invaluable public resource. The City offers the following comments regarding the proposed language in the Recycled Water Policy Amendments:	Comment noted. The commenter states City of San Diego's commitment to recycled water. No change is requested.	12. General Comment
10.002	***1. The proposed new language regarding "minimize[ing] the direct discharge*** *of treated ...wastewater to the ocean" should be moved from the Goals section* ***of the Policy to the Benefits section.***	See response to Comment 1.002.	2. Benefits of recycled water

No.	Comment	Response	Categories
10.003	The City is concerned about new language in the Policy creating a 'Goal' to "minimize the direct discharge of treated municipal wastewater to enclosed bays, estuaries and coastal lagoons, and ocean waters, except where necessary to maintain beneficial uses." The City agrees with WateReuse California and others, that minimizing ocean discharges is a means to meeting the state's recycled water goals but shouldn't be a goal in and of itself under the Recycled Water Policy. The Policy's goal should be to facilitate a safe and successful implementation of water recycling projects in California.	See response to Comment 1.002. The purpose of the Amendment is to encourage the safe use of recycled water from municipal wastewater sources in a manner protective of public health and the environment. The recycled water goals are statewide aspirations that are consistent with this purpose.	3. Goals, mandates, and reporting requirements
10.004	For example, when Pure Water San Diego, the City's potable reuse project, is completely implemented in 2035, discharges from the Point Loma Wastewater Treatment Plant are expected to be significantly reduced. Reduction of discharge to the ocean is an ancillary benefit of increased water recycling, whereas the goal is increased water reliability and a sustainable water supply. Discharge reductions such as this should occur on a case by case basis, as each locality's circumstances vary in ways that can impact the cost-effectiveness and feasibility of a recycled water project.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
10.005	*2. The new reporting requirements constitute good public policy, but the Board should align them with existing reporting processes to eliminate inefficient duplicative mandates on regulated agencies.* The City understands the need for thorough reporting to the state of influent, water produced, and treated water disposed, and is supportive of this policy as long as it is aligned with other existing reporting requirements, so that costly and inefficient duplicative reporting is avoided.	See response to Comment 1.037.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
10.006	The new language requires reporting to the State Water Resources Control Board (SWRCB) of the different beneficial uses to which recycled water is applied. Unfortunately, the list in the Policy excludes a number of valuable environmental uses, and the City supports comments made by the Los Angeles County Sanitation Districts, stating that uses such as natural system restoration, wetlands, wildlife habitat, and required minimum stream flows, should be included in the Policy's list of 'beneficial uses' of recycled water that must be reported to the state.	See response to Comment 5.023. Section 3.2.3 of the Amendment was revised to include natural system augmentation as a discharge reporting category to account for the amount of treated wastewater used to augment enclosed natural systems, wetlands, wildlife habitats, and duck clubs.	3. Goals, mandates, and reporting requirements
10.007	*3. The City has concerns regarding the proposed bioanalytical monitoring requirements.* The City believes that bioanalytical monitoring has the potential to provide valuable screening tools to assist in identifying Constituents of Emerging Concern (CECs) that may pose a risk to human health in potable recycled water systems. However, to be effective, the two proposed bioassays-along with any proposed response actions based on their results-must first be appropriately vetted before they are used for routine monitoring. The City has three primary concerns with the bioassay provisions of the proposed Policy:	Comment noted. The comment is an overarching statement. Specific comments are addressed responses to Comments below.	10. CECs and Attachment A
10.008	1. The recommended bioassay methods are not sufficiently standardized to allow recycled water producers to implement a full scale monitoring program.	See responses to Comments 8.018, 8.020, and 8.022.	10. CECs and Attachment A
10.009	2. Subjecting recycled water producers to response actions at the initial stages of monitoring is premature, as it is based on unverified and unstandardized testing protocols.	The timing of the response actions was revised. See responses to Comments 8.018, 8.020, and 8.022. Stating the analytical methods for the bioanalytical screening tools are “unverified and unstandardized” is a misrepresentation	10. CECs and Attachment A

No.	Comment	Response	Categories
		of the state of the science. The Panel recommended ER- *α* and AhR based on the "readiness" of the current analytical methods, which have been adequately standardized. "*The Panel recommends that the Estrogen Receptor alpha (ER-α) and the Aryl hydrocarbon Receptor (AhR) bioassays be used to respectively assess estrogenic and dioxin-like biological activities in recycled water. These two in vitro bioassays were selected because each have clear adverse outcome pathways that allow specific molecular responses to be adequately standardized for screening recycled water quality at potable reuse projects."(page ix of Panel Report)*	
10.010	3. The draft policy does not incorporate an adaptive framework that would allow a pilot evaluation to be completed under the direction of the CEC Science Advisory Panel ('SA Panel') before response actions are imposed on recycled water producers.	See responses to Comments 8.018, 8.020, and 8.022.	10. CECs and Attachment A
10.011	The City believes that the draft Policy's approach to bioanalytical monitoring implementation should be replaced with the three-phase approach recommended by the SA Panel in their report 'Monitoring Strategies for Constituents of Emerging Concern in Recycled Water' (SA Panel Report), though it may be possible to adjust the time frame for each phase and still provide a workable solution. This approach, along with several additional criteria, should be followed to provide a thorough assessment of the readiness and applicability of the two proposed bioanalytical methods for routine monitoring.	See responses to Comments 8.018, 8.020, and 8.022.	10. CECs and Attachment A
10.012	Elements of the SA Panel's three-phase approach that should be included in the Policy (as well as other, additional provisions that we believe are necessary) in order to produce defensible data from these bioassays, are described below.	See responses to Comments 8.018, 8.020, and 8.022.	10. CECs and Attachment A

No.	Comment	Response	Categories
10.013	**a. Replace the phasing proposal currently included in the draft Policy with the SA Panel's recommended three-phase structure.** The City supports the need to begin collecting data in order to advance the science of biomonitoring. However, the SA Panel Report reiterates that requiring response actions during the initial data collection phase is premature and thus not appropriate until such methods are fully validated, critically evaluated, and certified by the appropriate entities [e.g. the SWRCB's Environmental Lab Accreditation Program (ELAP)].	See responses to Comments 8.018, 8.020, and 8.022 regarding the revisions to the phased monitoring approach for bioanalytical screening tools and response to Comments 1.046 and 1.049 regarding method selection and ELAP accreditation.	10. CECs and Attachment A
10.014	The City supports the SA Panel's recommendation that there be a phased approach to testing without immediate regulatory repercussions (SA Panel Report, Section 7.4). This would allow municipalities and labs to build an historical dataset, understand the extraction, analytical, and QA process, and troubleshoot challenges, prior to full-scale implementation of the new testing.	See responses to Comments 8.018, 8.020, and 8.022 regarding the revisions to the phased monitoring approach for bioanalytical screening tools. However, section 4.14.2 of Attachment A clearly states, “In a Memorandum to the State Water Board on Bioanalytical Monitoring Trigger Levels, the Panel stated, “At this time, the Panel also stresses that their recommendations for bioscreening should not be misconstrued as suitable for incorporation into the [Recycled Water Policy] as a regulatory limit for compliance but rather, as noted above, for screening level analysis only.” Attachment A is consistent with this strong recommendation from the Panel. The inclusion of bioanalytical screening in Attachment A and the monitoring trigger levels and response actions in section 5.3 of Attachment A are intended as investigatory screening tools at this time. The bioassay monitoring should be implemented to provide additional information about potentially bioactive CECs in recycled water for groundwater recharge and reservoir water augmentation.” The response actions in Tables 8 and 10 will ensure that recycled water producers are screening for the CEC	10. CECs and Attachment A

No.	Comment	Response	Categories
		Monitoring Parameters and appropriately responding to the monitoring results from the recycled water treatment facility.	
10.015	Disregarding the SA Panel's recommendation of a phased implementation approach is inappropriate and could lead to unsupported conclusions regarding the safety of recycled water.	See responses to Comments 8.018, 8.020, and 8.022.	10. CECs and Attachment A
10.016	**b. Convene a new, ongoing advisory entity-the Bioanalytical Advisory Group-and charge them with the development of uniform standard operating procedures (SOPs) for all participating laboratories, before the commencement of the data collection period.**	See responses to Comments 8.016 and 8.031.	10. CECs and Attachment A
10.017	The SA Panel recommends the creation of a "Bioanalytical Advisory Group" which would consist of select SA Panel members, other stakeholders, SWRCB staff, and representatives from commercial laboratories (SA Panel Report, Section 7.4.3). The purpose of the group would be to define goals for bioanalytical monitoring; specify protocols for sampling, extraction, measurement, data reporting, and laboratory intercalibration; and provide guidance for interpretation of bioanalytical monitoring results, including Quality Assurance/Quality Control (QA/QC) data.	See responses to Comments 8.016 and 8.022.	10. CECs and Attachment A

No.	Comment	Response	Categories
10.018	However, we disagree with the SA Panel that the proposed bioassay methods are ready to be used in Phase I of implementation. These are not methods that are typically relied upon in recycled water or wastewater laboratories today. It would be beneficial for these standardizations to be documented in SOPs before Phase I is initiated.	See responses to Comments 8.018, 8.020, and 8.022.	10. CECs and Attachment A
10.019	Therefore, the City recommends that the Bioanalytical Advisory Group be convened before the start of Phase I in order to provide guidance to municipalities and outside laboratories during the initial phases of testing. This will ensure the appropriate levels of standardization are implemented from the beginning of the monitoring program.	See responses to Comments 8.022 and 8.031.	10. CECs and Attachment A
10.020	The draft Policy is silent regarding the establishment of a Bioanalytical Advisory Group, leading to concern that it will not be formed. The duty to establish the Group should be expressly stated in the Policy, along with a clear description of the Group's purpose.	See response to Comment 8.016.	10. CECs and Attachment A
10.021	**c. Require the SA Panel and Bioanalytical Advisory Group to develop, oversee, and test an interim interpretive framework for the application of the proposed bioassays, based on the interpretation of data from Phase I.**	See responses to Comments 8.016, 8.018, 8.020, 8.022, and 8.031.	10. CECs and Attachment A
10.022	The SA Panel Report warned that an interpretative framework had not yet been completed, noting that established *In Vitro* Bioassay (IVB) Monitoring Trigger Levels (MTLs) do not yet exist, making it "premature to propose a framework describing appropriate responses to varying BEQ/MTL ratios at this time».	See responses to Comments 8.016, 8.018, 8.020, and 8.022.	10. CECs and Attachment A

No.	Comment	Response	Categories
10.023	It is clear the SA Panel believes that the biomonitoring interpretive framework, including the determination of appropriate MTLs and of associated response actions, should not be developed until after the Phase I data collection period is completed and those data interpreted.	See responses to Comments 8.016, 8.018, 8.020, and 8.022.	10. CECs and Attachment A
10.024	The City supports the SA Panel's approach and recommends that the development of this interim interpretive framework, including the assignment of appropriate response actions, be directed by the SA Panel with input from the Bioanalytical Advisory Group, SWRCB staff, and stakeholders. After the interim interpretive framework is written, the Phase II pilot evaluation of this framework could commence.	See responses to Comments 8.016, 8.018, 8.020, and 8.022.	10. CECs and Attachment A
10.025	**a. At the conclusion of Phase II pilot evaluation, the CEC Science Advisory Panel should assess the applicability of the proposed bioassay methods and recommend associated response actions for inclusion in routine monitoring of potable recycled water systems.** Because Phase II (as described in the SA Panel Report, section 7.4.3) is a pilot evaluation, this framework must be subject to a critical assessment after its completion.	See responses to Comments 8.018 and 8.020.	10. CECs and Attachment A
10.026	In addition, the City recommends that the results of the Phase II evaluation-which is necessary before the full implementation of bioanalytical monitoring- be used to support the future development of recommended response actions. This corresponds to Phase III as described in the SA Panel Report.	See responses to Comments 8.018 and 8.020.	10. CECs and Attachment A

No.	Comment	Response	Categories
10.027	**b. Any response actions associated with biomonitoring must be clearly enumerated, defined and consistently applied** Both Table 8 and Table 10 specifically enumerate response actions, but also include two provisions allowing for open-ended authority for water boards to impose any number of additional required responses. This lack of clarity in enforcement procedures will make it difficult for recycled water producers to plan operational responses or anticipate an appropriate budget for compliance, since many of the listed possible actions are expensive and potentially unending.	Currently, CEC monitoring is intended to be investigatory and not for regulatory compliance with a specific limit such as a maximum contaminant level or water quality objective. For both targeted chemistry and bioanalytical screening tools, the response actions for exceeding the monitoring trigger levels are to further investigate the exceedance if the magnitude of the exceedance is greater than a factor of 10 higher than the monitoring trigger level. The Amendment does not require any response actions if the magnitude of an exceedance is less than a factor of 10 greater than the monitoring trigger limits because the purpose of the CEC monitoring requirements is to investigate the occurrence and magnitude of CECs in recycled water and the monitoring trigger levels are relatively conservative values. Table 8 is from the Recycled Water Policy Amendment adopted in 2013 and is necessary to evaluate potentially high concentrations of health-based CECs in recycled water for potable applications. Table 10 of Attachment A includes a list of response actions, but not a prescriptive framework. This allows adequate flexibility for the recycled water producer to work with the State and regional water board to identify appropriate response actions on a case-by- case basis. The response actions are intended to be investigatory follow-up to identify the source of the bioactivity. Additional actions include following up with more monitoring, conducting targeted analytical chemistry, or conducting additional diagnostics to identify the source of estrogenicity or AhR activation. Since the ER-α assay has a health-based trigger level, the response actions should appropriately investigate the source as they may be indicative of estrogenic CECs present above concentrations known to cause impacts to human health.	10. CECs and Attachment A

No.	Comment	Response	Categories
		Tables 8 and 10 allow for the Water Boards to consult with a recycled water producer on a case-by-case basis to determine appropriate response actions based on an evaluation of the data and circumstances. Additionally, there is now a 1 -year grace period before bioanalytical monitoring will need to begin and a 3-year initial assessment phase for bioassays in which no response actions will be required. See response to Comments 6.006, 8.018, and 8.020. See the Phased Monitoring and Data Evaluation section in 4.14.2 of the Staff Report with SED for further discussion.	
10.028	The City requests that the Policy's existing open-ended allowances for the imposition of additional response actions be replaced with specific, stepwise responses.	See response to Comment 10.027.	10. CECs and Attachment A
10.029	*4. The City recommends changes related to QA/QC protocols for monitoring of CECs to ensure the defensibility of data produced.* a. As more information about CECs becomes available, the rate at which the state of the science improves will accelerate. The process should be flexible enough to allow for additional opportunities to adjust the policy to incorporate recent developments. To do so, the City recommends that section 10.2.1 be revised to state: "The State Water Board shall convene a Science Advisory Panel at least every five years as needed to guide future actions relating to CECs."	Section 1 of Attachment A was revised to improve the quality assurance/quality control requirements. See response to Comment 2.010 regarding developing a flexible CEC program and reconvening the Panel.	10. CECs and Attachment A

No.	Comment	Response	Categories
10.030	b. Current language in 10.2.2 could be interpreted to mean panel members are required to be proficient in all areas of expertise or that all areas must be represented. The City recommends that section 10.2.2 be revised to state: "The Panel shall be composed of members representing one or more of the following areas of expertise: human health toxicology, environmental toxicology, epidemiology, biochemistry, civil engineering (particularly the design and construction of recycled water treatment facilities), analytical chemistry (particularly the design and operation of advanced laboratory methods for the detection of CECs), and human health pathology (particularly antibiotic resistant bacteria and antibiotic resistance genes)...."	The second sentence of section 10.2.2 of the Amendment makes it clear that each panelist only needs to have experience in their respective area of expertise, not in all of the listed areas of expertise.	10. CECs and Attachment A
10.031	c. Ensure that Section 1 of Attachment A is consistent with ELAP regulations. As currently drafted, some of the provisions of Section 1 appear to be inconsistent with the ELAP regulations being developed. The Board should ensure that the requirements and definitions included in the Policy be consistent with the final adopted ELAP regulation in order to provide clarity and to support proper implementation by laboratories under ELAP's jurisdiction.	See response to Comment 1.046. This Amendment was developed in coordination with ELAP, the Division of Drinking Water, and other programs at the Water Boards.	10. CECs and Attachment A

No.	Comment	Response	Categories
11	**City of Santa Rosa Water** **Commenter: Bennett Horenstein**		
11.001	On behalf of the City of Santa Rosa Water Department, I am writing to provide input and comments on the proposed amendments to the Recycled Water Policy (Policy). The City of Santa Rosa is the owner and operator of the Santa Rosa Subregional Water Reuse System (Subregional System), one of the largest water recyclers in the State. The Subregional System produces high-quality tertiary treated recycledwater for urban and agricultural irrigation, irrigating many schools, parks and businesses, as well as approximately 6,000 acres of farmlands and vineyards. The Subregional System also supplies recycled water to the Geysers Recharge Project, providing, on average, 13 million gallons of recycled water per day to the Geysers steamfields, where it is used to produce "clean" electricity for up to 100,000 households in the North Bay Area. Depending upon the amount of rainfall in any given year, between 95 and 100 percent of the Subregional System's wastewater is recycled. Santa Rosa Water supports the State Water Board's effort to promote the use of recycled water through the Recycled Water Policy. Our below comments provide suggestion s on how to further streamline recycled water planning and permitting as well as encourage new recycled water projects.	This is an introductory statement to Comments 11.002 to 11.008; no response is needed.	12. General Comment

No.	Comment	Response	Categories
11.002	**1. The Policy should minimize duplicative reporting requirements** Santa Rosa Water supports the centralization and streamlining of recycled water reporting; however, benefits of doing so may be lost if other avenues of reporting are not discontinued. Rather than creating a new database system, the State Water Board should consider implementing recycled water reporting via CIWQS. Many agencies, under their NPDES permit or Water Discharge Requirements (WDR), are already required to report some data using CIWQS. Instead of requiring double reporting, the State should integrate future reporting requirements into the existing reporting system. In addition to tracking progress towards statewide goals, having centralized, reliable recycled water data from agencies will be instrumental in regional water management planning. Santa Rosa Water appreciates that the Board recognizes the limitation of current recycled water reporting methods, specifically that the survey conducted every few years by the Department of Water Resources (DWR) is "infrequent, labor intensive and time consuming, and challenging for both permittees and staff."	See response to Comment 1.037.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
11.003	While we recognize that the Board does not have authority over DWR, we urge the Board to collaborate with DWR and include language in the Proposed Amendment, similar to Section 3.4, which states: "The State Water Board requests that DWR work with the State Water Board to develop a reporting database and discontinue its recycled water survey."	The requested change was not made. See response to Comment 1.037. State Water Board intends to avoid duplicative reporting through the development of streamlined statewide reporting requirements that are intended to supersede existing regional water board reporting requirements, thereby reducing duplication. These data will be publicly available, including to other state agencies, such as Department of Water Resources (DWR). The State Water Board collaborates with other agencies, including DWR, to ensure recycled water volume reporting requirements address the needs of those agencies to the extent possible. For example, the State Water Board conducted the 2015 Recycled Water Survey in collaboration with DWR. The Amendment's reporting requirements will eliminate the need for periodic recycled water surveys. Other agencies may require data reporting through their respective authorities that may be beyond the scope of this Amendment. For example, DWR may require additional reporting through Urban Water Management Plan requirements.	4. State agency roles
11.004	**The requirement for Salt and Nutrient Management Plans (SNMPs) should be removed from the Policy** The existing Policy states that every groundwater basin in California should have a SNMP, and set a deadline for the establishment of a SNMP. Protection of groundwater from adverse salinity and nutrient impacts is appropriate, but recycled water is not typically the primary source of salinity or nutrients in groundwater basins. Therefore, inclusion of the SNMP requirements within the Recycled Water Policy is misplaced. The passage of the Sustainable Groundwater Management Act (SGMA) in 2014 appeared to be an opportunity to incorporate SNMPs	See response to Comment 1.027.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	into SGMA plans and reduce overlapping groundwater planning efforts. However, the objectives of the SNMP and SGMA are not identical and exist within different statutory frameworks and agencies.		
11.005	The draft proposed amendment requires Regional Boards to evaluate and prioritize groundwater basins for SNMP development based on the United States Geological Survey's (USGS) Groundwater Ambient Monitoring and Assessment (GAMA) Program, SGMA, or more region-specific factors in basin evaluation that better represent the conditions of the region. This proposed change recognizes the importance of providing flexibility at the regional level to evaluate the need for SNMPs. The development and implementation of SNMPs should be a part of a larger stakeholder effort to manage the quantity and quality of groundwater in California. In fact, the draft amendment encourages water and wastewater entities, together with local salt and nutrient contributing stakeholders, to collaboratively develop SNMPs for groundwater basins, as required. The passage of SGMA in 2014 created this opportunity and provided the means to move the salt and nutrient management planning component out of the Policy and into SGMA, where stakeholders can work collaboratively to manage salts and nutrients on a basin-wide or watershed-wide basis.	See responses to Comments 1.026 and 1.027.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
11.006	Santa Rosa Water disagrees with the Board's recommendation to keep the SNMP program housed within the Recycled Water Policy rather than migrating it into SGMA. We believe incorporating SNMP into SGMA is a more appropriate program and pathway to develop and successfully achieve the goals of salt and nutrient management planning and reduce overlapping groundwater quantity and quality planning. For the above reasons, we recommend that the Policy require the State Water Board to work with DWR and other stakeholders to develop a policy or agreement for migrating the SNMP into SGMA.	See response to Comment 1.027.	6. Salt and nutrient management plans
11.007	**3. Priority pollutant monitoring should be removed from the State General Order** The proposed amendment removes the monitoring requirements for priority pollutants from the Recycled Water Policy. Water Board staff reviewed priority pollutant monitoring data and concluded that exceedance rates are extremely low. Priority pollutants are largely industrial chemicals whose uses have diminished since they were incorporated into regulation decades ago. The Proposed Amendment correctly shifts monitoring resources from historic pollutants to emerging contaminants and their potential impact s in potable recycled water projects. Additionally, priority pollutant monitoring in recycled water is already a requirement in publicly owned treatment facilities' NPDES permits or WDR.	To implement the Amendment, the Executive Director of the State Water Board will issue an order pursuant to Water Code sections 13267 and 13383 to update the monitoring and reporting programs of all applicable recycled water permits to comply with the Amendment. In this order, priority pollutant monitoring requirements for landscape irrigation recycled water projects would be removed, unless priority pollutant monitoring is separately required by the permit, such as for NPDES permits. Section 4.9.1 of the Staff Report with SED contains rationale and analyses supporting the removal of priority pollutant monitoring requirements for landscape irrigation recycled water projects. Specifically, incidental runoff is not allowed according to the Uniform Statewide Recycling Criteria, and this prohibition is included in WDRs and permits for landscape irrigation use of recycled water. Section 4.9.1 of the Staff Report with SED also includes an analysis of available priority pollutant data that aided in the justification for removing priority pollutant monitoring requirements for landscape irrigation recycled water projects.	7. Permitting for Non-potable

No.	Comment	Response	Categories
		Additionally, if a compound were of particular concern, the regional water board could require project-specific monitoring if justification could be made under Water Code section 13267. The Amendment removes priority pollutant monitoring requirements only for landscape irrigation projects. Potable reuse projects, such as groundwater recharge and reservoir water augmentation projects, are separately required to monitor for priority pollutants under CCR, title 22.	
11.008	Santa Rosa Water appreciates the removal of duplicative monitoring requirements; however, recommends that prior to any deadline requiring the enrollment of new permittees, the Monitoring and Reporting Program in Order WQ 2016-0068-DDW be revised to remove priority pollutant monitoring as well.	See responses to Comments 1.045 and 11.007.	3. Goals, mandates, and reporting requirements
12	**Community Water Center** **Commenter: Deborah Ores**		
12.001	These organizations write regarding the proposed Amendment to the Recycled Water Policy (the "proposed Amendment"). We strongly support the goal of increasing the use of recycled water. However, the Recycled Water Policy must place the protection of water quality on equal footing with this worthy goal. Several revisions are required to ensure that water quality is protected and to require a fair process that includes disadvantaged communities, communities of color and low-income communities as stakeholders.	This is an introductory statement to Comments 12.002 to 12.037.	12. General Comment

No.	Comment	Response	Categories
12.002	**A. The Goals Stated in Section 3.1.** We support the revised goals stated in Section 3.1 of the Amendment. We are particularly in favor of increasing the use of recycled water to the extent it is feasible to do so while protecting groundwater quality. The numeric goals for increased use are ambitious and appear appropriate.	The commenter is in support of the goals in section 3.1 of the Amendment; no change is requested.	12. General Comment
12.003	In addition to the two goals already stated in 3.1, we recommend adding a third: 3.1.3. To regulate the use of recycled water and other sources of salt and nutrients to achieve and ensure compliance with water quality objectives. The Recycled Water Policy and proposed Amendment already contain provisions related to the protection of water quality and development of salt and nutrient management plans (SNMPs). This additional goal thus does not change the substance of the Recycled Water Policy. Instead, it elevates water quality to the same level of importance as encouragement for the production and use of recycled water.	The Amendment was not revised with the proposed change. The Policy is a water quality control policy with the express purpose of encouraging the safe use of recycled water while ensuring the protection of public health and the environment. Water quality protection is inherent to the purpose of this water quality control policy, and therefore a third goal is not needed to restate the Water Board's responsibility to ensure compliance with water quality objectives.	3. Goals, mandates, and reporting requirements
12.004	**B. The Amendments Must Expressly Include Environmental Justice Communities And Organizations As Stakeholders In Meaningful Public Process.** While we support the adoption of plans that allow for streamlined permitting of recycled water projects, the implementation of specific projects could have unintended consequences on local communities. Specifically, while a project may comply with the overall requirements of a regional salt and nutrient management plans, its implementation could have	Section 6.2.1 of the Amendment states that "the State Water Board encourages local water and wastewater entities … to continue locally driven and controlled, collaborative processes *open to all stakeholders* …" (emphasis added). Environmental justice communities are encouraged to participate in the stakeholder process involved in developing an SNMP. As stated in section 6.2.1.5 of the Amendment, the regional water board may use its authority pursuant to Water Code section 13242 to adopt plans and programs of implementation whether or not an SNMP has been accepted to address scenarios where water quality objectives are not being met. The basin planning process requires a full public process, including	13. Comment out of scope

No.	Comment	Response	Categories
	localized impacts that disproportionately impact local communities.	consideration of environmental impacts pursuant to CEQA. This process also requires public participation, allowing impacted communities and environmental justice groups to participate in the public process. In addition, the regional water boards have other existing regulatory programs, including WDRs (agriculture and dairy orders, etc.) in which to address site-specific impacts. The SNMP program within the Policy is a collaborative process that is open to all stakeholders. As such, the concern articulated in this comment can be addressed through the stakeholder participation process.	
12.005	We recommend that this policy include protections for local communities including: identification of local impacts on water quality or supply; mitigation of impacts; and public meeting requirements to inform community members of the project, and get feedback on community concerns and how and if those concerns can be addressed in project implementation.	See response to Comment 12.004.	13. Comment out of scope
12.006	**C. SNMP Guidance.** We support the amendments to the extent that they provide additional guidance to the regional water boards and stakeholders regarding the process for proposing, accepting and evaluating implementation of an SNMP. We suggest some amendments to provide further clarification and a stronger review process:	This is an introductory statement to Comments 12.007 to 12.015.	6. Salt and nutrient management plans
12.007	● Section 6.2.2.3.: Further define the extent to which basin plan amendments should be "based on" the accepted SNMP. We ask that the provision be modified to clarify that the regional water board retains discretion to adopt basin plan amendments **"based on the accepted salt and nutrient management plan, comments on the salt and nutrient management plan, and other materials, as appropriate."**	Section 6.2.3.3 of the Amendment was revised in response to this comment to state, "In this case, the regional water board shall initiate a process to amend the basin plan based on the accepted salt and nutrient management plan and associated documentation." The basin planning process includes associated documentation that is considered in the development of a basin plan amendment, including stakeholder comments, technical documents, and supplementary materials.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
12.008	● Section 6.2.3.: This provision sets forth an alternate timeline for review of a proposed SNMP if "compliance with CEQA is required." The provision should be revised to require that the regional water board inform the public within an appropriate amount of time of its determination regarding whether compliance with CEQA is required.	Section 6.2.3 of the Amendment was revised to require the regional water board to notify the public within six months of receipt of a proposed SNMP of its determination that compliance with CEQA will be required.	6. Salt and nutrient management plans
12.009	● Section 6.2.6.: A regional water board should not wait ten years before evaluating the data generated by and implementation of an SNMP. This section should be revised to state that ***all*** SNMPs, regardless of when they were adopted, must be evaluated every five years, despite any alternate timelines established in basin plan amendments.	See response to Comment 2.016. The Amendment was revised to reflect a maximum 5-year review period.	6. Salt and nutrient management plans
12.010	Further, we appreciate that the proposed Amendment encourages coordination between Salt and Nutrient Management Plan stakeholders and SGMA groundwater sustainability agencies (GSAs). GSAs are already working to develop groundwater sustainability plans (GSPs) to address undesirable results, including groundwater quality. Close coordination allows stakeholders to share expertise and resources while avoiding duplication of effort.	The commenter is in support of section 6.2.1.4 of the Amendment, which outlines the potential for coordination between GSAs and SNMP stakeholder groups; no change is requested.	6. Salt and nutrient management plans
12.011	We note, however, that in areas where salts and nutrients are an especially complicated and pervasive issues a separate SNMP focused on salt and nutrients is likely required, and a GSP is unlikely to serve as an adequate alternative on its own.	See response to Comment 1.027.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
12.012	Critically, the language around the SNMPs does not emphasize the necessity of ensuring groundwater meets drinking water standards. While many basins within the state are not contaminated, there are many other communities reliant upon a contaminated source of water. This is especially true in agricultural regions where fertilizer and animal manure seep into the ground, contaminating drinking water supplies.	Section 6.1.2 of the Amendment asserts that "Salts and nutrients 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." In many cases, beneficial uses include the MUN beneficial use for municipal and domestic drinking water supply. As such, the Amendment already includes the change requested by the commenter. In addition, section 6.2.1.5 of the Amendment emphasizes regional water board authority to ensure attainment of water quality objectives to support beneficial uses, including MUN: "the provisions in 6.2 are not intended to limit regional water board authority pursuant to Water Code section 13242 to adopt plans and programs of implementation for the protection of beneficial uses." Lastly, the State Water Board has broad authority to ensure access to safe drinking water for all Californians. See Cal. Health and Safety Code §§116270 and 116271.	6. Salt and nutrient management plans
12.013	There must be stronger requirements for basins which are not currently meeting drinking water standards to develop a plan with clear performance goals in order to meet drinking water standards as soon as possible. Otherwise restoration can turn into a drawn out process where dischargers and the regulatory agencies continue to delay at the expense of communities forced to either buy bottled water or pay high, and sometimes unaffordable, water rates to ensure their family's health and safety.	Staff agrees with the commenter regarding the goal of achieving water quality objectives and the need to address communities whose groundwater supplies are impacted with salts and nutrients. However, as discussed in the Staff Report with SED, recycled water typically represents a relatively small portion of the total loads of salts and nutrients that are contributing to this problem, and it is not appropriate to apply the total burden of aquifer restoration on the recycled water producers and users. The SNMP program within the Policy is a collaborative process. Section 6.2.1.5 of the Amendment states that the regional water board may use its authority pursuant to Water Code section 13242 to adopt plans and programs of implementation whether or not an SNMP has been accepted to address scenarios where water quality objectives are not being met.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
12.014	Monitoring is one tool that can help prevent drinking water standard exceedances and aid restoration projects. Section 6.2.4.1.1 states that monitoring "must focus on water supply wells and areas proximate to large water recycling projects…" While we agree with this, monitoring well locations must also be proximate to drinking water supply wells. An increase in nitrate in a drinking water supply can cause a significant public health risk immediately.	There are thousands of drinking water supply wells located throughout groundwater basins in California. Stating that monitoring locations should be proximate to this wide distribution and vast number of supply wells is overly broad and not practicable.	6. Salt and nutrient management plans
12.015	Monitoring wells need to also be located near potential sources of salt and nutrient discharge such as farms, animal facilities, wastewater treatment plants, and food processing plants. Monitoring near these facilities will help catch where there are fluctuations in discharges that may endanger beneficial uses.	Section 6.2.4.1 of the Amendment was revised to specify that a monitoring plan must focus on areas proximate to large water recycling projects and other sources of salts and nutrients. The SNMP is required to consider all sources of salts and nutrients in a basin as part of the evaluation of assimilative capacity. However, as discussed in section 3.4 of the Staff Report with SED, recycled water typically represents a relatively small portion of the total loads of salts and nutrients in most groundwater basins. As a result, it is not appropriate to place the burden of monitoring for potential impacts from all potential sources of salts in the basin on the recycled water producer. Rather, monitoring of potential impacts from individual potential dischargers should fall primarily on the discharger through the WDR permitting process.	6. Salt and nutrient management plans
12.016	We do support staff's encouragement of the use of existing groundwater monitoring wells utilized in other regulatory programs to prevent the duplication of similar efforts.	The commenter is in support of section 6.2.4.1.2 regarding existing monitoring wells; no change is requested.	12. General Comment
12.017	We propose the following addition to the proposed Amendment: 6.2.4.1.4. The monitoring plan shall be designed to identify potential threats to drinking water sources.	See response to Comment 12.015.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
12.018	Additionally, as mentioned in Section B, environmental justice communities and organizations must be included within the process to develop salt and nutrient management plans. Nitrate is an acute contaminant which can cause significant health problems very quickly, in particular for more vulnerable populations such as infants and pregnant women. Farmworker communities are especially impacted by nitrate contamination, and yet they are not invited to participate or contribute to the process which allegedly aims to address nitrate loading. Dischargers and state or local agencies may develop solutions which are not actually feasible or beneficial to communities.	See response to Comment 12.004.	6. Salt and nutrient management plans
12.019	We propose the addition of the following language to the proposed Amendment: 6.2.1.6 The development, analysis, adoption and implementation of a salt and nutrient management plan shall include the identification of communities that could be negatively impacted by plan implementation, and shall incorporate the input and expertise of potentially impacted and low-income communities in developing plans and mitigating potential impacts.	See response to Comment 12.004.	6. Salt and nutrient management plans
12.020	6.2.4.6. A plan for identifying, avoiding and mitigating potential or actual negative impacts of plan implementation on communities.	See response to Comment 12.004.	6. Salt and nutrient management plans
12.021	**D. The Proposed Amendments Do Not Comply With The State Antidegradation Policy.** The State Antidegradation Policy is set forth in Resolution 68-16, which states in part that high quality waters shall "be maintained until it has been demonstrated to the State that any change will be consistent with maximum benefit to the people of the	See responses to Comments 2.051 and 2.057.	7. Permitting for Non-potable

No.	Comment	Response	Categories
	State, will not unreasonably affect present and anticipated beneficial use of such water and will not result in water quality less than that prescribed in the policies." Resolution 68-16 further states that "[a]ny activity which produces or may produce a waste or increased volume or concentration of waste and which discharges or proposes to discharge to existing high quality waters will be required to meet waste discharge requirements which will result in the best practicable treatment or control of the discharge necessary to assure that (a) a pollution or nuisance will not occur and (b) the highest water quality consistent with the maximum benefit to the people of the State will be maintained." As set forth in SWRCB guidance and case law, the finding that a change in water quality will be "consistent with the maximum benefit to the people of the State" must be "affirmatively demonstrated" and made on a "case-by-case basis…based on considerations of reasonableness under the circumstances at the site." *(Asociacion de Gente Unida por el Agua v. Central Valley Regional Water Quality Control Bd.* (2012) 210 Cal.App.4th 1255, 1279; State Bd., Guidance Mem. (Feb. 16, 1995) p. 2.) In making this "case-by-case" finding, the Board must consider the following factors "(1) past, present, and probable beneficial uses of the water (specified in Water Quality Control Plans); (2) economic and social costs, tangible and intangible, of the proposed discharge compared to the benefits, (3) environmental aspects of the proposed discharge; and (4) the implementation of feasible alternative treatment or control methods." (Id.)		

No.	Comment	Response	Categories
12.022	Contrary to these requirements, the proposed Amendments do not require that all recycled water projects that degrade high quality waters be subject to a "case-by-case" analysis "based on considerations of reasonableness under the circumstances at the site." Instead, the Amendments allow the proponent of a recycled water project to demonstrate compliance with Antidegradation by demonstrating consistency with an accepted SNMP and related basin plan amendments. (See Amendments §§ 7.3.2.2.5 ["Non-potable recycled water project proponents can satisfy the requirements of the Antidegradation Policy by submitting an analysis demonstrating that the project is consistent with the criteria specified in 7.3.2.1 to the regional water board with a report of waste discharge, which includes compliance with any applicable salt and nutrient management plan accepted by the regional water board pursuant to 6.2.3.2 or any applicable basin plan amendment adopted by the regional water board pursuant to 6.2.3.3."], 8.2.2 ["For groundwater recharge projects within a basin for which the regional water board has adopted a basin plan amendment based on an accepted salt and nutrient management plan pursuant to 6.2.3.3, compliance with the Antidegradation Policy may consist of conducting an analysis demonstrating that the project is consistent with the adopted basin plan amendment."].) As these provisions improperly substitute a program-level Antidegradation analysis for the required site-specific case-by-case analysis, the proposed Amendments do not comply with or implement the State Antidegradation Policy.	See responses to Comments 2.051 and 2.057 .	7. Permitting for Non-potable

No.	Comment	Response	Categories
12.023	We understand the inclination to streamline permitting and review of recycled water projects, and agree that permitting may be streamlined. We also agree that an Antidegradation analysis for a recycled water project may be based, in part, on the technical findings of the accepted SNMP and related adopted and approved basin plan amendments.	This comment is linked to Comment 12.024.	12. General Comment
12.024	We do not, however, agree that consistency with an SNMP can stand in for a site-specific Antidegradation analysis; nor do we believe that proper application of Antidegradation requirements will unnecessarily impede recycled water projects.	See response to Comment 2.051.	7. Permitting for Non-potable
12.025	Beyond our interest in avoiding precedent that erodes the requirements of the Antidegradation Policy, our objections here are practical and tangible. First, we note that an SNMP is only required to conduct an Antidegradation analysis of existing projects and "reasonably foreseeable future projects." (Amendments § 6.2.4.5.) As such, if consistency with an SNMP is sufficient to demonstrate compliance with the Antidegradation Policy, projects that were not reasonably foreseeable at the time that the SNMP was proposed will not be subject to any Antidegradation analysis.	Section 7.3.2 of the Amendment was revised in response to this comment, as follows: 7.3.2. *Basin plan amendment*. For non-potable recycled water project proponents within a basin with a basin plan amendment based on an accepted salt and nutrient management plan, compliance with the Antidegradation Policy may consist of an analysis demonstrating that the project is consistent with the adopted basin plan amendment. <u>If a project is not consistent with the adopted basin plan amendment as determined by the regional water board, compliance with the Antidegradation Policy may be based, in part, on the technical findings of the salt and nutrient management plan or basin plan amendment, as applicable.</u> This change incorporates the revision suggested by the commenter in Comment 12.032 and provides the regional water board further guidance in determining compliance with the Antidegradation Policy. A project may be inconsistent with the adopted basin plan amendment if it does not fit within a class of projects that were reasonably foreseeable at the time the antidegradation analysis for the accepted salt and nutrient management plan was prepared.	7. Permitting for Non-potable

No.	Comment	Response	Categories
		In addition, when engaged in a planning process, like the preparation of an SNMP, it is impossible to evaluate projects that are not reasonably foreseeable at the time that the plan is prepared but might be foreseeable at some point in the future. Section 6.2.6 of the Amendment requires a data assessment every 5 years, and section 6.2.7 of the Amendment includes a requirement to consider whether any updates or revisions to the SNMP are warranted in response to this periodic data assessment. Section 6.2.6 of the Amendment was revised to include a requirement to consider projects that are now reasonably foreseeable but may not have been when the SNMP was initially prepared.	
12.026	Second, an SNMP and related basin plan amendments may expressly defer project-specific Antidegradation analysis.	See response to Comment 12.025.	7. Permitting for Non-potable
12.027	For example, the Staff Report in support of the Amendments to the Water Quality Control Plans for the Sacramento River and San Joaquin River Basins and the Tulare Lake Basin to Incorporate a Central Valley-Wide Salt and Nitrate Control Program expressly defers any site-specific analysis: "The antidegradation analysis is for the programmatic level commensurate with the development of the SED for the Preferred Alternative. There is no ability at the current time to evaluate any particular project that may occur as a result of implementing the elements of the proposed strategies, policies, and guidance. However, antidegradation analysis will be performed as specific projects and discharge conditions warrant."	See response to Comment 12.025.	12. General Comment

No.	Comment	Response	Categories
12.028	(Staff Report § 5.5, p. 343.) As such, a project's consistency with the Central Valley SNMP cannot demonstrate compliance with the Antidegradation policy, given that the SNMP and related basin plan amendments did not conduct any project-level Antidegradation analysis.	This is a comment on a proposed amendment to the Central Valley Regional Water Board Basin Plan and is beyond the scope of the Amendment.	7. Permitting for Non-potable
12.029	Third, assuming for sake of argument that the Central Valley SNMP and basin plan amendments themselves comply with the Antidegradation Policy,[1] consistency with the SNMP may not in all cases demonstrate compliance with the Antidegradation Policy.	See response to Comment 2.051 and 12.025.	7. Permitting for Non-potable
12.030	The Central Valley basin plan amendments (which at the time of this letter have been adopted by the Regional Board but which have not been approved by the SWRCB) allow for the calculation of assimilative capacity of nitrate in groundwater to be horizontally averaged across large areas, up to and including a subbasin. As acknowledged by the basin plan amendments and related staff report, such averaging will cause exceedances of the nitrate MCL in localized areas. Thus, it is possible for a recycled water project to exacerbate or create exceedances in a localized area and comply with the SNMP.	This is a comment on a proposed amendment to the Central Valley Regional Water Board Basin Plan and is beyond the scope of the Amendment.	7. Permitting for Non-potable
12.031	Depending on the location of the exceedance, and the proximity of public or private drinking water wells, such a project may be consistent with the SNMP but inconsistent with the Antidegradation Policy.	This is a comment on a proposed amendment to the Central Valley Regional Water Board Basin Plan and is beyond the scope of the Amendment.	7. Permitting for Non-potable

No.	Comment	Response	Categories
12.032	For these reasons, the Antidegradation provisions in the proposed Amendments to the Recycled Water Policy must be revised. Specifically, Section 7.3.2.2.5 should be revised to state: Antidegradation analysis. ~~Non-potable recycled water project proponents can satisfy the requirements of the Antidegradation Policy by submitting an analysis demonstrating that the project is consistent with the criteria specified in 7.3.2.1 to the regional water board with a report of waste discharge, which includes compliance with any applicable salt and nutrient management plan accepted by the regional water board pursuant to 6.2.3.2 or any applicable basin plan amendment adopted by the regional water board pursuant to 6.2.3.3.~~ **For non-potable recycled water projects within a basin with (i) a salt and nutrient management plan accepted by the regional board pursuant to 6.2.3.2, or (ii) a basin plan amendment that has been adopted by the regional water board and approved by the state board which is based on an accepted salt and nutrient management plan pursuant to 6.2.3.3., the antidegradation analysis may be based, in part, on the technical findings of the salt and nutrient management plan or basin plan amendments, as applicable.**	Portions of the commenter's suggested changes were incorporated into section 7.3.2 of the Amendment. See responses to Comments 12.025 and 2.051 for an explanation.	7. Permitting for Non-potable
12.033	Similarly, Section 8.2.2. should be revised to state: For groundwater recharge projects within a basin for which the regional water board has adopted**, and the state water board has approved,** a basin plan amendment based on an accepted salt and nutrient	Changes were made to section 8.2.2 of the Amendment as follows: For groundwater recharge projects within a basin ~~for which the regional water board has adopted~~ with a basin plan	8. Permitting for GWR

No.	Comment	Response	Categories
	management plan pursuant to 6.2.3.3, ~~compliance with the Antidegradation Policy may consist of conducting an analysis demonstrating that the project is consistent with the adopted basin plan amendment~~ **the antidegradation analysis may be based, in part, on the technical findings of the adopted and approved basin plan amendments and associated staff report.** These amendments maintain the Antidegradation Policy as presently interpreted by the courts and SWRCB guidance.	amendment based on an accepted salt and nutrient management plan pursuant to 6.2.3.3, ~~compliance with the Antidegradation Policy may consist of conducting an analysis demonstrating that the project is consistent with the adopted basin plan amendment~~ the antidegradation analysis may be based, in part, on the technical findings of the basin plan amendment. In addition, a definition was included for "basin plan amendment" in the Definitions section, which defines a basin plan amendment as "an amendment to a water quality control plan that has been adopted by the regional water board and approved by the State Water Board and Office of Administrative Law." Associated staff reports for basin plan amendments were not included in the revised text because it is implied that the technical findings of a basin plan amendment are likely found in the staff report and other technical documents that were relied upon to develop the basin plan amendment. See also response to Comment 2.051.	
12.034	Further, by expressly authorizing insofar as appropriate the technical work completed by SNMP stakeholders and the regional water boards, proponents of recycled water projects and the regional water boards will save time and resources completing the required site-specific analysis.	See responses to Comments 12.025 and 12.033.	6. Salt and nutrient management plans
12.035	We strongly believe that this strikes the proper balance between the desire to streamline and encourage the increased use of recycled water and the need to prevent degradation of high quality waters consistent with the maximum benefit to the people of the State.	See responses to Comments 12.025 and 12.033.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
12.036	**<u>All References To Adopted Basin Plan Amendments Must Be Revised To Refer To Adopted And Approved Basin Plan Amendments.</u>** The proposed Amendment refers in several locations to basin plan amendments adopted by the regional water board. (See, e.g., Amendment § 8.2.2.) Such basin plan amendments "shall not become effective unless and until it is approved by the state board." (Water Code § 13245.) As such, all references to basin plan amendments adopted by the regional water board must be revised to refer to basin plan amendments which are adopted by the regional water board ***and*** approved by the SWRCB.	See response to Comment 12.033. A definition of "Basin Plan amendment" was added to the Amendment to address this comment.	6. Salt and nutrient management plans
12.037	**<u>Reporting Should Be Available To The Public.</u>** We agree that the SWRCB should evaluate progress toward meeting the goals of the Recycled Water Policy, and appreciate the reporting requirements set forth in Section 3.2. However, these provisions should be revised to ensure transparency by requiring that reporting results are made available to the public in an online database.	See response to Comment 1.026. The reporting information will be made available online.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
13	**Coachella Valley Water District** **Commenter: Steve Bigley**		
13.001	The Coachella Valley Water District (CVWD) appreciates the opportunity to provide comments on the proposed Recycled Water Policy amendment. CVWD provides domestic water, wastewater, recycled water, irrigation/drainage and regional stormwater protection services to more than 107,000 homes and businesses across 1,000 square miles in the Coachella Valley. Recycled water is a key component of CVWD's long-range water management plans. CVWD recognizes the benefits of providing statewide consistency for permit requirements for recycled water projects but is concerned that some of the proposed amendments undermine the goal of the policy to promote the use of recycled water. We encourage the State Water Resources Control Board to continue its support of the increased development and use of recycled water as one piece of a broader strategy to mitigate the effects of long-term drought, climate change, and water supply uncertainty.	This comment is an introductory statement to Comments 13.002 to 13.014.	12. General Comment
13.002	<u>Section 3. Goals and reporting requirements to track recycled water</u> The reporting requirements for municipal wastewater treatment plants set forth in section 3 have the potential to impose significant costs on the plant operators, which may be passed on to the public. We appreciate the value of the data that will be generated by such reporting. However, implementing these requirements by way of executive order, as proposed in section 3.2, would be ill-advised as it may constitute an impermissible underground regulation.	An "underground regulation" is an administrative regulation that a court may determine to be invalid because it was not adopted in substantial compliance with the Administrative Procedure Act (APA). *Excelsior College* v. *California Bd. of Registered Nursing* (App. 3 Dist. 2006) 39 Cal.Rptr.3d 618, 136 Cal.App.4th 1218. The APA establishes rulemaking procedures and standards for state agencies in California. The requirements set forth in the APA are designed to provide the public with a meaningful opportunity to participate in the adoption of state regulations and to ensure that regulations are clear, necessary, and legally valid. The APA is found in California Government Code, section 11340 et seq. (Gov. Code Title	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
		2, Div. 3, Part 1, Chapter 3.5). Government Code section 11353 provides that for state policy for water quality control, only specified provisions of the APA are applicable. The Amendment, including the reporting requirements, is being considered for adoption in compliance with section 11353 and provides significant opportunities for public participation. Consequently, adoption of the Amendment is not an "underground regulation." The reference to an order from the State Water Board Executive Director in section 3.2 of the Amendment is merely an order to implement the requirements of section 3.2 and would be authorized by Water Code section 13267(f) whether or not the Amendment is adopted by the State Water Board.	
13.003	Any rule or standard of general application is a "regulation" that must be adopted pursuant to the California Administrative Procedures Act (APA). "Regulation" is defined as "a rule or standard of general application" that implements the law enforced by the state agency imposing the rule or standard. *(Center for Biological Diversity v. Department of Fish and Wildlife* (2015) 234 Cal.App.4th 214, 259 – 261; Gov. Code § 11340.600.) The proposed reporting requirements would meet that definition. The proposed reporting requirements also have the potential to impose a significant financial burden on municipal wastewater treatment plant operators and recycled water producers. Compliance with the APA would ensure that this financial impact is properly evaluated. (Gov. Code, §§ 11346.3 and 11345.5, subd. (a)(6).) The State Water Board should commit to complying with the established rulemaking process under the APA.	See response to Comment 13.002.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
13.004	We recommend that the Draft Recycled Water Policy be revised to provide that reporting requirements will be adopted pursuant to the established rulemaking procedures set forth in Government Code section 11340 et seq. to ensure adequate public discussion and debate on the merits of the proposed reporting requirements and the potential financial impact. With the foregoing in mind, we recommend that subsections 3.2.1 and 3.2.2, including all subsections thereunder, be deleted and subsection 3.2 be revised to read as follows: 3. Goals and reporting requirements to track recycled water 3.2 Reporting requirements. The State Water Board will evaluate progress toward these goals and revise the goals or establish mandates as necessary. To support this evaluation, the State Water Board will adopt regulations to require electronic reporting by municipal wastewater treatment plants of the volume of influent, treated water produced, and treated water disposed of, and to require recycled water producers to electronically report the volume of treated water produced and disposed.	See response to Comment 13.002.	3. Goals, mandates, and reporting requirements
13.005	<u>Section 5. Wastewater change petitions</u> The Draft Policy includes a new section, Section 5, that addresses wastewater change petitions submitted to the State Water Board pursuant to Water Code section 1211. We support encouraging early coordination by the recycled water project proponent with the various regulatory entities to facilitate and expedite, to the	The commenter is in support of section 5 of the Amendment, which includes language encouraging early coordination in the process of funding and permitting recycled water projects to ensure compliance with Water Code section 1211; no change is requested.	12. General Comment

No.	Comment	Response	Categories
	degree possible, the implementation of recycled water programs.		
13.006	However, Section 5 improperly expands the authority of the State Water Board and creates duplicative, and potentially competing, environmental analyses, thus undermining the purpose of the Draft Recycled Water Policy of encouraging recycled water projects. In addition, Section 5 needlessly restates established law governing water rights and the State Water Board's jurisdiction over water right change petitions. We recommend that Section 5 be clarified and significantly streamlined.	See responses to Comments 8.035 and 8.037. The State Water Board supports the use of recycled water when the impact does not unreasonably affect other public trust resources (e.g., fishing, recreation, etc.) where the impact cannot be mitigated.	5. 1211 and WW Change Petitions
13.007	Water Code section 1211, subdivision (a) provides that a proposed change to the point of discharge, place of use or purpose of use of treated wastewater that will result in a decrease in the flows of any portion of a watercourse requires approval by the State Water Board. Section 1211, subdivision (b) exempts from the requirements of subdivision (a) any change that will not result in a decrease in the flows of a watercourse. Subsection 5.1 restates the requirements of Water Code section 1211. However, the language in subsection 5.1 is broader than merely change petitions. As written, subsection 5.1 requires a recycled water project proponent to obtain State Water Board approval prior to receiving state funding for the treatment or use of recycled water, regardless of whether the project involves a change petition. This requirement is in excess of the State Water Board's authority. Section 1211 does not grant the State Water Board authority to approve or deny wastewater treatment projects that do not involve a change in the point of discharge, place of use or purpose of use of treated wastewater.	See responses to Comments 7.006 and 8.035.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
13.008	Subsection 5.1 also states that proposed changes to wastewater discharges must receive (a) a determination from the State Water Board's Division of Water Rights that an order approving the change is not required; or (2) State Water Board approval for the proposed change pursuant to Water Code section 1211. The requirement that a recycled water project proponent obtain a State Water Board determination that the project will not result in a decrease in flows is directly contrary to the language of section 1211, subdivision (b). Section 1211, subdivision (b) expressly exempts from State Water Board jurisdiction those projects that will not result in a decrease in the flows of a watercourse. Nothing in section 1211 obligates a wastewater treatment plant operator to obtain a State Water Board determination that the proposed change is exempt, and nothing requires such a determination before obtaining state funding. Furthermore, there is no process for obtaining such a determination from the State Water Board. Presumably the State Water Board would use the same, or similar, process used to approve a change petition. Wastewater change petitions can take anywhere from six months to five years, depending on the complexity and degree of opposition. Adoption of the same, or similar, process for a project that does not decrease stream flows has the potential to significantly delay projects and discouraging project proponents, and thus is contrary to the State Water Board's stated goal of encouraging recycled water projects. Because section 5.1 of the Draft Policy impermissibly exceeds the State Water Board's authority and has the potential to discourage recycled water project, we recommend that subsection 5.1 be deleted. Subsection 5.2 is merely a restatement of the State Water Board's responsibilities when evaluating any	The State Water Board has the authority to implement new requirements through a policy for water quality control developed pursuant to Water Code section 13140, including requirements for determinations as to whether a wastewater change petition is required. The intent of the determination (or concurrence) step is not to add a process similar to Water Code section 1211 for all projects, but simply to confirm whether or not a Water Code section 1211 petition will be required for the subject recycled water project or program. For this reason, section 5.1 of the Amendment was retained with revisions. See also the response to Comment 7.006. Generally, the State Water Board finds it beneficial to emphasize the growing challenge of maintaining adequate stream flows while supporting increased recycled water use. Therefore, section 5.2 of the Amendment, related to Wastewater Change Petitions, is included to highlight this important step in the recycled water approval process (where applicable) and is retained.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
	water rights change petition and is unnecessary in the context of a policy document. We recommend it be deleted.		
13.009	Finally, subsection 5.3, as written, appears to state that the State Water Board has authority, in addition to and separate from the requirements of CEQA, to determine the cumulative effects of a wastewater change petition. This potentially creates a duplicative process not authorized by law, and without any guidelines for how the State Water Board would conduct its cumulative impacts analysis. To the extent subsection 5.3 is simply a restatement of the State Water Board's authority as a lead agency under CEQA for wastewater change petitions, this subsection is unnecessary in the context of a policy document. In this instance, it also has the potential to create confusion as to the scope and extent of the State Water Board's authority to analyze the cumulative effects of a wastewater change petition. We recommend that subsection 5.3 be deleted. With the foregoing in mind, we recommend that subsections 5.1, 5.2, 5.3 and 5.4 be deleted and section 5 be revised to read as follows: 5. Wastewater change petitions In many cases, recycled water project proponents will be required to obtain approvals from several regulatory agencies prior to implementing their project. If the proposed recycled water project will result in reduced stream flows, an approved "wastewater change petition" may be required pursuant to Water Code section 1211. For this reason, the State Water Board encourages early coordination by the recycled water project proponent with the State Water Board's Division of Water Rights and Division of Financial Assurance, the	The commenter asserts that section 5.3 of the Amendment, indicating that the State Water Board may consider cumulative impacts of water diversion and recycled water projects on streams, is not authorized by law. This is incorrect. The State Water Board has the existing authority to consider cumulative effects under both CEQA and Public Trust Authority as further described in response to Comment 7.008.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
	applicable regional water board or boards, Department of Water Resources, and the Department of Fish and Wildlife, as necessary, in the process of funding and permitting recycled water projects. Approval of a wastewater change petition shall not be construed to release any recycled water project proponent from the obligation to comply with any regional water board requirements applicable to the recycled water project.		
13.010	<u>Section 6. Salt and nutrient management plans</u> Section 6.2.6 establishes new requirements for Regional Water Boards, in consultation with stakeholders, to assess and review monitoring data generated from Salt and Nutrient Management Plans approximately every 5 years but no more than every 10 years and outlines the elements to be included in these periodic reviews. Periodic reviews are vital to understanding trends in groundwater quality, the ability of the monitoring network to characterize groundwater quality in the basin, data gaps, and assimilative capacity. While we encourage these periodic reviews, we believe that this section could benefit from greater clarity regarding the role of the entities that developed the Salt and Nutrient Management Plans. The involvement of these entities is crucial since they will be the most familiar with the plan implementation and resulting data. However, it should be clearly stated that the burden of these periodic reviews will not fall on the entities that developed Salt and Nutrient Management Plans. These entities have already covered the cost of developing the plans, costs which were considerable for some basins (more than $600,000 for the Coachella Valley Basin) due to the need for highly technical modeling, as well as on going costs of implementing monitoring. Particularly since as stated in section 6.2.7, results of these periodic reviews may	Section 6.2.6 of the Amendment states that "the regional water boards, in consultation with stakeholders, shall assess and review the monitoring data." This places the primary burden and responsibility of the review on the regional water boards, in consultation with stakeholder groups. The State Water Board encourages the regional water boards to collaborate with stakeholders in this review process. State Water Board staff concludes that 5 years is an appropriate timeframe for review of water quality data collected pursuant to SNMPs. See response to Comment 2.016.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	require updates to the Salt and Nutrient Management Plans. Given the importance of detecting valid trends and the effort that will be expended in the assessments and updates, we encourage the State Water Board to consider periodic review at a frequency of every 10 years.		
13.011	Section 7. Permitting and antidegradation analysis for non-potable recycled water projects Section 7.3.2.1.3. states that for irrigation projects, application of recycled water should be at a rate that minimizes percolation below the root zone. Recycled water will need to percolate below the plants' root zone or the plants will not survive. This is a critical irrigation method for golf courses irrigating with recycled water. Depending on soil type, the water may indeed percolate past the root zone without overwatering. Plant root zones vary depending on the type of plant and frequency of irrigation. The root zone can extend 12" and the depth to groundwater can be considerably deeper, thus unlikely to have an impact on the groundwater water quality. The operation and management plan cannot be a one-size-fits-all, even if the customer type is the same. This should be a best management practices (BMP) or guidelines document rather than an operation and management plan. This BMP information is already included in most Salt and Nutrient Management Plans and should not be prescribed as a separate operation and management plan.	See responses to Comments 2.051 and 4.012.	7. Permitting for Non-potable

No.	Comment	Response	Categories
13.012	<u>Section 8. Permitting and antidegradation analysis for groundwater recharge projects</u> Section 8 needs to be revised to clarify that it applies only to recharge projects using recycled water. Section 8.1, permitting for groundwater recharge projects, is too broad, insofar as it arguably is applicable to all groundwater recharge projects and not merely those that involve recharge with recycled water. As written, the Draft Policy requires all groundwater recharge projects to comply with regulations related to recycled water (see subsection 8.1.2.1.) Clearly this would be inappropriate for groundwater recharge projects that recharge the groundwater basin with local storm water or imported water, such as State Water Project water.	The term groundwater recharge is specifically defined in the Definitions of the Amendment as the planned use of recycled water for replenishment of a groundwater basin or an aquifer that has been designated as a source of water supply for a public water system (Water Code section 13561(c)). As used in the Amendment, the term groundwater recharge only applies to projects using recycled water, consistent with the Definitions section.	8. Permitting for GWR
13.013	A challenge, both for the Regional Water Quality Boards and for entities developing Salt and Nutrient Management Plans, has been the lack of guidance for calculating assimilative capacity for a basin or subbasin. In some cases, this lack of clarity has resulted in Salt and Nutrient Management Plans not being accepted by Regional Water Quality Boards due to disagreements about the approach that should be used to calculate assimilative capacity. The proposed amendments do not provide clarification on this matter. However, section 8.2.4.1 provides guidance for calculating assimilative capacity for recycled water projects where Salt and Nutrient Management Plans have not been accepted. As stated, the baseline assimilative capacity shall be calculated by comparing the mineral water quality objective with the average concentration of the basin or subbasin. We believe that this approach is sound and should be broadly adopted within the Draft Recycled Water Policy to provide clear guidance in the development and acceptance of Salt and Nutrient Management Plans.	The appropriate scale of spatial averaging used to calculate assimilative capacity depends on a number of project- and basin-specific factors, including the distribution and construction of water supply wells, the structure of aquifers, the nature of salt and nutrient sources in the basin, stakeholder interests, and other factors. For example, the basin plan amendments to implement CV-SALTS (currently in review by the State Water Board) propose different averaging depths within the aquifer based on the type of permit. This averaging guidance was developed by the CV-SALTS stakeholder group, in consultation with the Central Valley Regional Water Board, and is subject to the public review process. State Water Board staff concludes that the Policy should not include guidance on this issue, which may overly restrict solutions that may be developed by stakeholder groups in consultation with the regional water board. Section 8.2.4.1 of the Amendment was revised to state that assimilative capacity shall be calculated by comparing the mineral water quality objective with the representative concentration of the basin or subbasin, as determined by	6. Salt and nutrient management plans

No.	Comment	Response	Categories
		the regional water board. This allows for flexibility to consider project- and basin-specific factors.	
13.014	Section 11. Maximizing consistency in permitting recycled water projects Section 11.2 states that coverage under existing regional water board general orders for non-potable water uses of recycled water will terminate one year from the effective date of the proposed Recycled Water Policy. Regional Water Boards shall, where appropriate, transition enrollees from these orders to Order WQ 2016-0068-DDW by the same date. As written, this opens the possibility that prospective enrollees may lose coverage if requirements to transition to Order WQ 2016-0068-DDW are not met by the effective date, including filing an NOI, providing the required documentation, and receiving authorization from the Regional Water Boards. We believe that it is prudent to clarify how coverage for recycled water projects will be maintained during this transition period.	See responses to Comments 1.009 and 1.010. The amendment was revised in response to comments to allow for a phased transition.	11. Permit review and update
14	**Coalition of Accredited Laboratories** **Commenter: David Kimbrough**		
14.001	CAL would like to thank you for this opportunity to submit comments on the proposed amendment to the Policy for Water Quality Control for Recycled Water. CAL understands that the State Board wants to maximize its water resources of California and the use of recycled water plays an important part in achieving that objective. CAL agrees that it is essential that monitoring data produced during the course of a recycled water project needs to be of sufficient quality allow data users and decision makers to make the necessary steps to protect public health and the environment.	This comment is an introductory statement to Comments 14.002 to 14.026, below.	12. General Comment

No.	Comment	Response	Categories
	CAL has no opinion on the proposed Amendment to the Recycled Water Policy as a whole. CAL interest in this Amendment is as it affects laboratories. The comments below are focused on the parts of Attachment A of the proposed Amendment.		
14.002	Attachment A outlines requirements for monitoring constituents of emerging concern for recycled water. In the preamble to Attachment A the goal is identified as follows: *"This section is to ensure laboratories conducting [Chemicals of Emerging Concern] monitoring generate data of known, consistent, and documented quality and to verify that the laboratory can meet the required reporting limits."* CAL supports this goal as public health and environmental protection agencies need consistent, accurate and precise data to make informed and useful decisions.	The language quoted in the comment has been removed from the Amendment and replaced with requirements to develop and implement a QAPP. See responses to Comments 1.046 and 1.047.	10. CECs and Attachment A
14.003	Attachment A also proposes a mechanism to achieve this goal: *"The recycled water project proponent or recycled water producer shall develop a quality assurance project plan that is consistent with this Policy. The quality assurance project plan shall be submitted to and approved by the regional water board prior to beginning any sampling and analysis."* CAL supports this very reasonable approach to addressing monitoring Contaminants of Emerging Concern ("CEC"). The development of a Quality Assurance Project Plan ("QAPP") by each Recycled Water Project Proponents ("RWPP") would ensure that each recycled water project achieves the objectives of the State Board Water Resources Control Board	Comment noted. The comment is a statement of support. Section 1 of Attachment A and section 4.14.4 of the Staff Report with SED were revised to clarify the requirements for developing and implementing a QAPP. See responses to Comments 1.046 and 1.049.	10. CECs and Attachment A

No.	Comment	Response	Categories
	("State Board") Policy. This is important as the Environmental Laboratory Accreditation Program ("ELAP") does not currently offer accreditation for CECs and the State Board has not yet identified a list of approved methods for the analysis of all CECs. However even without these limitations, the requirement to develop a QAPP for each RWPP would still be a positive proposal. Using QAPPs is a generally sound approach to managing environmental projects.		
14.004	While CAL supports the general concepts of the Attachment A and the use of QAPPs, this approach can be improved to better achieve the objectives of the Policy.	See response to Comment 14.003.	10. CECs and Attachment A
14.005	Attachment A also uses the term Quality Management System ("QMS"). This is generally associated with the International Standard Organization ("ISO") and is used for commercial and industrial application and not generally environmental compliance testing but generally covers man of the same concepts as USEPA's QMP. The use of these two different terms is confusing and cumbersome and QMS is quite naturally a much broader and less well- defined term than QPM. **CAL recommends that the terms QAPP or QMP be used for a more clear and consistent policy. This would exclude the term QMS due to the lack of reference in State and National quality manual guidance.**	See responses to Comments 1.046 and 1.049.	10. CECs and Attachment A
14.006	Attachment A references The NELAC Institute ("TNI") documents as part of the QMS and only as it applies to laboratories. The ISO QMS and the USEPA / State board QMP are both much larger concepts and programs than just laboratories. The State Board identified 24 elements found in each QAPP, of which only four or five apply to laboratories (B3 – B8). **CAL requests that Attachment A require all 24 quality assurance elements specified by USEPA and State**	See responses to Comments 1.046 and 1.049.	10. CECs and Attachment A

No.	Comment	Response	Categories
	Board QMP and QAPP documents to be incorporated in the regulatory process.		
14.007	The inclusion of TNI laboratory documentation requirements produces additional difficulties. While ELAP had once offered laboratory accreditation TNI accreditation as an option for laboratories it ceased to make that option available several years ago. It is our understand that ELAP has no plans to offer the TNI option for the foreseeable future. While CAL feels that laboratories should have the option of applying for TNI accreditation if it is in their best interests to do so, CAL is very much against any sort of specification that would require laboratories to obtain TNI accreditation**. CAL requests that all references to TNI be removed from Attachment A.**	See response to Comment 1.046.	10. CECs and Attachment A
14.008	Attachment A uses the terms QAPP and Quality Management System ("QMS") without defining either. If the State Board would like to use QAPPs as a central part of the Recycled Water Policy, it would be best if it defined the term. The United States Environmental Protection ("USEPA") has numerous documents which describe what a QAPP is and how to develop a QAPP. In similar situations, USEPA uses a system based upon Quality Management Plans ("QMP") which are described in many documents but most specifically QA-G2 (guidance) and QA-R2 (requirements) where QAPPs are defined. The State Board has many of its own documents discussing the use of QAPPs such as the May 2017 for Surface Water Ambient Monitoring Program ("SWAMP")1, which are based on the USEPA QMP. Attachment A does not reference any of the extensive documentation available both from the State Board and from the USEPA. Attachment A appears to be "reinventing the wheel". CAL would suggest that a more reasonable and appropriate approach would be for the State Board	See responses to Comments 1.046 and 1.049.	10. CECs and Attachment A

No.	Comment	Response	Categories
	to use the existing terms and concepts of QAPP and QMPs currently in use by the State Board. **CAL would like to suggest that Attachment A reference USEPA and SWRCB QMP and QAPP documents.**		
14.009	The QMP and QAPP include a Sampling and Analysis Plan ("SAP") which includes laboratory requirements but has much more than that. The TNI documents do not reference any specific laboratory requirements and merely reference back to method requirements or data user requirements. **CAL requests that Attachment A require the development of an SAP as part of the QAPP and that the requirements for what is in the SAP be specified in Attachment A. CAL also requests the elimination of references to TNI & a QMS as not applicable in for this policy update.**	Since the QAPP elements encompass Sampling and Analysis Plan information, a separate Sampling and Analysis Plan is not required. Additionally, the USEPA states that a Sampling and Analysis Plan is intended for short-term studies, not ongoing monitoring events such as the proposed ongoing monitoring requirements for CECs. Also, see responses to Comments 1.046 and 1.049.	10. CECs and Attachment A
14.010	QAPPs are part of a QMP. As such, including the requirement for both a QMP and QAPP in Attachment A would create a more robust statewide policy. **CAL requests that Attachment A include the requirement for the development of both a QMP and QAPP to strengthen environmental testing quality.**	The State Water Board encourages the recycled water producers to develop and implement a Quality Management Plan (QMP) that documents how their organization structures its quality system and describes its quality policies and procedures, criteria, roles, responsibilities and authorities. However, Attachment A of the Amendment only requires a QAPP because the requirements in Attachment A are project-specific, so requiring a document to addresses the project-specific considerations and documents the project's technical planning process is appropriate.	10. CECs and Attachment A
14.011	The QMP and QAPP both begin and end with the Principal Data Users ("PDU") and Decision Makers ("DM"). The QAPP is built around the needs of the PDUs and DMs, they need to decide what degree of quality they need to accomplish the goals of this policy, in this case to maximize the safe and beneficial use of recycled water. **CAL would request that Attachment A clearly identify whom the PDUs and DMs are and**	Section 4.14.4 of the Staff Report with SED was revised to clarify the Principal Data Users and Decision Makers include the State Water Board, regional water boards, the recycled water facilities, and possibly others. However, depending on the recycled water facility, other Principal Data Users and Decision Makers may be involved and will be identified on a case-by-case basis in each QAPP.	10. CECs and Attachment A

No.	Comment	Response	Categories
	what their goals are for this Policy in general and for the data generated by laboratories covered by Attachment A and this Policy in particular. The PDUs and DMs should include at least the Division of Drinking Water ("DDW") and the RWPPs.	Therefore, it is not necessary to list PDUs and DMs in the Amendment.	
14.012	The establishment of Data Quality Objectives ("DQO") are institutional framework of a QMS and a QAPP. Attachment A needs to set DQOs, which can then be the basis for the Project Assessment and Evaluation Plan ("PAEP"), an item within the QAPP. The DQOs need to meet the needs of both the PDUs and DMs. For example, the PDUs may decide the need for accurate results for an effective assessment of the process performance. One DQO would then be the need for accurate laboratory results**. CAL requests that Attachment A clearly identify the DQOs that the PDUs need in a PAEP.**	Data Quality Objectives (DQOs) are an essential part of a QAPP. The State Water Board will work with the regional water boards and stakeholders as resources allow to develop portions of the QAPP, including data quality objectives and data quality indicators for the CEC Monitoring Parameter in Attachment A. (see section 4.14.4 of the Staff Report with SED). The QAPP does not require a Project Assessment and Evaluation Plan (PAEP). A PAEP is a specific document that is required for State Water Board grant recipients. A PAEP is not mandatory because the CEC monitoring requirements are not associated with grant agreements. Additionally, QAPP elements encompass information included in a PAEP. The QAPP does include a data quality assessment (Group D elements), thus an additional data quality assessment process is not required. Also, see response to Comments 1.046 and 1.049.	10. CECs and Attachment A
14.013	In a QAPP, DQOs need to be quantifiable, establish a metric to assess laboratory data quality and ensure it meets the needs of the PDUs. One such metric is Data Quality Indicator (DQI), In this case, the DQI would be Accuracy (or Bias). **CAL requests that Attachment A clearly identify DQIs for each DQO listed.**	See response to Comment 14.012.	10. CECs and Attachment A

No.	Comment	Response	Categories
14.014	For the laboratory section of the SAP, there needs to be specific metrics to make the DQIs tangible. There needs to be specific laboratory procedures identified to assess the laboratory's ability to generate data of sufficient quality to meet the needs of the PDUs. Measurement Quality Objectives (MQOs) are how QMPs and QAPPs link the activities of the laboratory to the PDUs through the SAP. Examples of MQOs would requiring the laboratory to verify the DLR once per batch by using a Quality Control Sample prepared at the DLR concentration and requiring that the laboratory recover a fix amount, e.g. +/-30%. **CAL requests that Attachment A clearly identify MQOs for each DQO listed as part of a SAP.**	See response to Comment 14.012.	10. CECs and Attachment A
14.015	Attachment A uses the term "Reporting Limits" numerous times but does not define what that term means in this context. Under the Clean Water Act, the lowest reportable value is either the Minimum Level ("ML") or the Method Detection Limit ("MDL") depending upon the situation. In California in the drinking water regulations, the Detection Limit for Reporting ("DLR") or the Minimum Reporting Level ("MRL") are used. In each case, these terms are defined. **CAL requests that the State Board use the concept of the DLR as the most appropriate approach as this is how drinking water analytes have been regulated in California for many years.**	The Amendment now includes the following definition for Reporting Limit: *"The measured value of an analyte that can be reliably detected and quantified within acceptable limits of precision and bias for a given method. This value is further defined as no lower than the lowest calibration standard performed within the calibration process. Reporting limits are the minimum value below which data are documented as non-detects."* This definition is consistent with the definition from the State Water Board's California Office of Information Management and Analysis (OIMA) and the method reporting limits the Panel contemplated and used to recommend the method reporting limits in Table 1 and 3 of Attachment A. Section 4.1 of the Staff Report with SED has also been revised to describe the Reporting Limit definition in greater depth.	10. CECs and Attachment A

No.	Comment	Response	Categories
14.016	The DLR has historically been defined as the lowest concentration that at least 80% of accredited laboratories can achieve an acceptable level of accuracy. It has the advantage of being based upon both a useful and tangible DQO (accuracy) and on laboratory capacity as well as being consistent with past DDW regulations. Instituting a policy that is not achievable is antithesis of what the policy should be accomplishing. Before RWPP's can require laboratories achieve some reporting limit, there have to be enough laboratories that are capable sufficient sensitivity. **CAL requests that the State Board first determine the DQOs and MQOs that it finds necessary to achieve the objectives of this Policy, set the DLRS on those DQOs and MQOs, and then determine if sufficient laboratory capacity exists to support those DQOs and MQOs.**	While the use of ELAP accredited laboratories is required, if ELAP accredits for the method used for analytes in Attachment A, ELAP accreditation is not available for all of the CEC Monitoring Parameters (see response to Comment 1.046). In that case, a recycled water producer could use other laboratories that can meet the reporting limits in Tables 1 and 3 of Attachment A and all of the other quality assurance provisions in the QAPP. The method reporting limits were recommended by the Panel based on their assessment of currently available analytical methods. If possible, the method reporting limits should be a factor of 10 below the monitoring trigger levels to increase the accuracy of the data. There is also the need to consider what can be practically achieved by laboratories using standardized methods (or modifications of standardized methods that have been validated and approved). We considered stakeholder feedback regarding some of the reporting limits in Table 1 of Attachment A, and made revisions as appropriate. Table 1 now includes the footnote, "The regional water board may approve higher reporting limits if it determines these reporting limits cannot be practicably met in recycled water sample matrices using existing methods, as long as the ratio between the reporting limit and the monitoring trigger limit (see Table 7) is no less than 2."	10. CECs and Attachment A

No.	Comment	Response	Categories
14.017	Attachment A establishes the goal of having Reporting Limits that laboratories routinely verify. CAL believes that this is a very important objective and fully supports it. However, CAL believes that the State Board needs to establish a procedure for verification. It is not enough to say that laboratories must verify the Reporting Limits, Attachment A needs to define the procedures for doing his. The USEPA has a well-defined set of Reporting Limits and verification procedures that have been in use for a number of years. **CAL requests that Attachment A simply use the verification procedures found in the Disinfection By-Product Rule for the MRL as a model for DLR verification in Attachment A.**	Reporting limit verification falls under the data generation and validation sections of the QAPP. See responses to Comments 1.046 and 1.049, and section 4.14.4 of the Staff Report with SED regarding the QAPP requirements.	10. CECs and Attachment A
14.018	Currently ELAP does not offer accreditation for most of the tests and analytes identified in Attachment A. It would be counter-productive to implement Attachment A either as written or in some other way without an accreditation process to support it. There would be no mechanism to determine what laboratory capacity exists both in terms of the number of laboratories capable of supporting this policy and their ability to achieve DQOs and MQOs at any given Reporting Limit. **CAL requests that the State Board establish accreditation procedures for ELAP so that accreditation can be available to support the objectives of this Policy.**	See response to Comment 1.046.	10. CECs and Attachment A

No.	Comment	Response	Categories
14.019	According to Attachment A, each RWPPs need to develop its own QAPP, submit it for approval to the State Board, and then require their laboratory to comply with the requirements in Attachment A. This is a good idea and consistent with the State Boards' use of QMPs and QAPPs in the past. However, for this to be an effective process, there need to be standards for the State Board to assess one QAPP as acceptable and another as not. Currently Attachment A is lacking in any set of standards for QAPPS that might be to assess QAPPs. Such standards would be a State Wide QMP for recycled water which has DQOs, DQIs, and MQOs as well as templates for QAPPS, PAEPs, and SAPs. These would the criteria for the State Board to approve or reject a QAPP Attachment. If a QAPP meets the required elements of the State-Wide QMP, it would be acceptable or it would need to be rejected until it comes into compliance with the QMP. **CAL requests that Attachment A explicitly establish criteria for what is an acceptable QAPP and that that be based on a State-Wide QMP for Recycled Water which include template QAPPs, PAEPs, SAPs, and include DQOs, DQIs, and MQOs.**	See response to Comment 14.012.	10. CECs and Attachment A
14.020	The core element of both the QMS and QAPP is Data Quality Assessment (DQA). Periodically the PDUs and DMs need to review the project holistically and assess it against the QAPP. Are the objectives of the recycled water project being met or are the objectives incorrect? This assessment would use the Policy and the QMS as the metric to answer such questions. **CAL requests that Attachment A include a requirement for a routine DQA process as part of the State-Wide QMS and each QAPP.**	Section 1 of Attachment A was revised as follows to address this concern: *"The QAPP shall be updated and re-submitted to the regional water board for approval when significant changes are made that would affect the overall data quality and use (e.g., using a new analytical chemistry laboratory) or at least annually if any changes are made. This attachment provides additional direction regarding specific components that must be considered when developing the QAPP."*	10. CECs and Attachment A

No.	Comment	Response	Categories
14.021	Attachment A reads as if the Board were proposing that each RWPP would be its own accreditation body and is using the proposed QAPP as tool to achieve this goal. This reading of the text would seem to be supported by the presentation of staff at the June 19 hearing in Sacramento. Staff appeared to indicate that while there are analytical methods could have the potential to become standardized, there are not yet a well defines set of actual standardized methods for all of the CECs identified. Further, it would seem that there is no list of laboratories that are documented to be capable of using these potentially standardized methods. The proposed Amendment has a very extensive and aggressive sampling program. It would be very concerning to picture dozens of RWPPs collecting large numbers of samples over an extended period at great expense and then having the results of little value. It would equally undesirable for there to be an insufficient number to support this program. Additionally, the Amendment specifies many reporting limits but it is unknown if there enough laboratories, or indeed any, that can achieve those reporting limits on a regular basis. These issues can only be resolved by establishing a robust laboratory accreditation program. A QAPP is not a substitute for such a program. **CAL requests that the Board identify or develop a list of standardized analytical methods for all listed CECs, have ELAP offer those methods for accreditation, and then assess the overall capacity of those laboratories that elect to become accredited to conduct the analyses to meeting DQOs and MQOs.**	We disagree that these issues can only be resolved by establishing a robust laboratory accreditation program. The absence of availability of ELAP accreditation does not preclude a program or laboratory from being able to successfully monitor and generate quality data that are reliable, repeatable, accurate, and precise. The State has limited resources to address issues associated with emerging contaminants and conduct activities such developing analytical methods, or initiating interlaboratory calibration studies to approve the analytical methods for statewide use. As we re-evaluate the list of CECs in future assessments, some of the CECs will no longer be found in the environment (e.g., product bans, replacement pharmaceuticals), other CECs will persist. CEC monitoring programs need to include adequate flexibility for adding and removing CECs from the list of testing parameters. The State will need to prioritize method validation and approval and ELAP accreditation for CECs that persist and those that have notification levels (e.g., PFOS, PFOA, NDMA), maximum contaminant levels, or water quality objectives. This is an appropriate approach considering the resource limitation and that the CEC monitoring is investigatory. Response to Comment 1.046 and section 4.14.4 of the Staff Report with SED include further discussion regarding the process of ELAP accreditation for the CEC Monitoring Parameters. Section 1 of Attachment A was revised to clarify how analytical methods are selected, validated and approved. Also see response to Comment 1.049. See response to Comment 14.016 regarding the practicality of the reporting limits.	10. CECs and Attachment A

No.	Comment	Response	Categories
14.022	An alternative approach would be for the State Board to develop a single State-Wide QMP to support the entire Recycled Water Policy. The QMP would identify the PDUs and DMs, their policy objectives, SAP, the DQOs, the DQIs, and MQOs, as well as a template for the QAPP. Each RWPP would develop a QAPP, PAEP, and SAP that would include all the elements specified in the QMP. This ensures an effective QAPP that serves the goals of the Recycled Water Policy and the needs of the PDUs and DMs while helping RWPPs develop QAPPs and implement recycled water projects.	The State Water Board does not currently have the resources to develop a Quality Management Plan for the Recycled Water Policy, but can work towards this goal as resources become available.	10. CECs and Attachment A
14.023	An Example of the Use of DQOs, DQIs, and MQOs 1,4-Dioxane is one of the analyte of concern specified in Attachment A. The QMP could identify that the State Board and RWPP as the PDU and DM need to monitor for 1,4-Dioxane as it is a suspected human carcinogen, is known to be a contaminant in groundwater, and is known to occur in recycled water. The QMP would then identify data quality to be a DQO to protect public health and the environment from 1,4-Dioxane, identify the DQI, which can then be incorporated into a template PAEP. The DQIs can be listed as Precision, Accuracy, Representativeness, Comparability, Completeness, and Sensitivity. Precision can be assessed by using sample replicates. Accuracy by matrix spikes and reference materials. Representativeness can be assessed through Data Quality Assessment (DQA). Comparability can be assessed by ensuring the use of appropriate methods and inter-laboratory comparisons such as Performance Testing samples. Completeness can be assessed through data verification. Sensitivity can be assessed through reporting limit verification. The PAEP and SAP can identify USEPA Method 522 or SW-846 Method 8270c as appropriate methods. In the template SAP	Comment noted. The comment provides additional information regarding specific components of the QAPP, which will be developed in the future.	10. CECs and Attachment A

No.	Comment	Response	Categories
	could include the use of Field Blanks (1 per sampling event, results less than the DLR), Field duplicates (1 per sampling event, Relative Percent Difference (RPD) < 30%), calibration curve, continuing calibration checks, laboratory reagent blanks, laboratory fortified blanks, matrix spike, and matrix spike duplicate (frequency and acceptance criteria as per the method). The PDUs and DMs need to review the data, conduct DQA through verification, validation, and reconciliation. Changes to the QMP and QAPPs should be made based upon the DQA.		
14.024	CAL agrees with the approach identified in Attachment A of using QAPPs which is positive, proactive, and necessary for the success of the Recycled Water Policy.	Comment noted. The comment is supportive of the QAPP and no change was requested.	10. CECs and Attachment A
14.025	However, CAL believes that a QAPP can only be useful if it is developed in the context of an entire QMP, specifically like that described by the USEPA and SWRCB, one that is detailed and specific and includes all parts of the Recycled Water Policy, not just the laboratory. The QMP should include MQOs, MQIs, MQOs, and template QAPPs that include PEAPs and SAPs.	See response to comment 14.022.	10. CECs and Attachment A
14.026	QAPPs need to be assessed within the broader context of a single state-wide QMP. A fully functioning and effective laboratory accreditation program for his effort is needed and QAPP alone will not achieve the objectives set out in the proposed Amendment.	See response to comment 14.022.	10. CECs and Attachment A

No.	Comment	Response	Categories
15	**El Dorado Irrigation District** **Commenter: Elizabeth Wells**		
15.001	The District appreciates the time and effort spent developing the revised Policy. I have attended the scooping and stakeholder meetings and provided input to staff at these meetings. Per the Board's request at the June workshop, the District has identified aspects of the draft Policy that are of significant concern to the District, and our comments are intended to develop Policy language that will provide a path to increase future recycled water project development and production.	This is an introductory statement to Comments 15.002 to 15.007.	12. General Comment
15.002	First, we are supportive of the annual recycled water reporting requirements included in the Policy. However, we request that the monthly reporting for municipal wastewater treatment plant influent, recycled water production and distribution data be modified to require reporting of quarterly data in an annual report at one time per year instead of setting a monthly report schedule. The District conducts recycled water meter reads and customer billing on a bimonthly basis. Therefore, we do not readily have recycled water monthly production and distribution data available. The monthly reporting would require ongoing additional staff time and programming changes to our customer billing database, resulting in additional expenses to our recycled water program that would ultimately burden our customers with higher recycled water rates. We believe reporting of quarterly data in an annual report will streamline staff time and provide information that could be analyzed on a seasonal basis.	In response to this and other comments, the Amendment was changed to require monthly frequency but annual reporting of wastewater influent, treatment, and discharge. In addition, the Amendment requires recycled water use to be reported on an annual basis. The commenter's situation of conducting recycled water meter reads and customer billing on a bimonthly basis would not conflict with this requirement. See response to Comment 2.100 for additional information on reporting frequency. In addition, the State Water Board is working to maximally streamline reporting of these data through the development of a wastewater and recycled water reporting tool, thereby limiting resource impacts on permittees. If the monthly frequency of wastewater influent, treatment, and discharge is found to be burdensome after implementation of the Amendment, section 3.2 of the Amendment was changed to allow the State Water Board Executive Director to modify the reporting requirements of this section as needed to effectively evaluate progress toward the goals.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
15.003	Additionally, we ask that all other duplicative tracking of recycled water uses be discontinued.	See response to Comment 1.037.	3. Goals, mandates, and reporting requirements
15.004	Secondly, we disagree with the inclusion of the new Policy goal to *Minimize the direct discharge of treated municipal wastewater to enclosed bays, estuaries and coastal lagoons, and ocean waters, except where necessary to maintain beneficial uses.* By including this goal, it has underlying meaning that one form of water recycling is more important than others. All forms of recycled water in the State important and all contribute to overall production goals. Additionally, this language could have unintended consequences in later years; such as grant and loan funding allocation. We request that this new goal is either removed from the Policy entirely or the language moved to the Benefits section.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
15.005	Third, the draft Policy requires that all old engineering reports (before 2000) be reviewed and updated in two years. If engineering reports need to be updated and approved, we ask that language is included in the Policy allowing projects to continue while the engineering reports are updated. In addition, the Policy should allow the District to maintain coverage under its master reclamation permit outside of the 2016 General Order.	Section 11.3.1 of the Amendment requires recycled water permits to be reviewed within three years and updated as necessary so that they are consistent with applicable regulations. The Amendment provides flexibility for regional water boards to determine the appropriate permitting mechanism for recycled water projects, including whether projects should enroll under Order WQ 2016-0068-DDW or a site-specific order, such as a master reclamation permit. See also responses to Comments 7.009 and 8.046.	11. Permit review and update

No.	Comment	Response	Categories
15.006	Lastly, the District requests that the Board revise the schedule for adoption of the Policy. Sufficient time should be allowed to work with State Water Board staff on the issues that were commented on at the public hearing in June. Working though these issues and developing the final Policy language should continue in a collaborative manner.	State Water Board staff conducted significant public outreach prior to releasing a draft Amendment on May 9, 2018. Staff conducted two CEQA scoping meetings, two staff workshops, and several focused meetings with individual stakeholders prior to the June 19, 2018 Board Hearing. Staff has carefully considered the public comments received through submitted comment letters and oral comments from the June 19, 2018 State Water Board hearing and worked collaboratively with stakeholders to address their comments.	12. General Comment
15.007	A Recycled Water Policy that streamlines the permitting of projects, recognizes the importance of all forms of recycled water, reduces duplicative reporting efforts, utilizes the recommendations of the CEC panel, and encourages future recycled water funding, will lead to a much larger portfolio of recycled water in the State. The District is committed to working with the State Water Board to develop a policy that advances the goal of increasing the use of recycled water.	This comment is continuation of comment 15.006. See response to Comment 15.006.	12. General Comment
16	**Friends of the North Fork** **Commenter: Michael Garabedian**		
16.001	When the State Water Resources Control Board (State Board) adopted the Recycled Water Policy in 2009, major factors were overlooked that have grown in importance each year since then. Senator Pavely's retirement is by itself is a major factor, because as the Senator was approaching retirement and then retired, bill authors have not emphasized as she did that wastewater repurposing (popularly known and sold as recycling and reuse) and public health must be closely tied together in state law and regulation. An added recognition for this need now exists because of the reorganization of the Division of Drinking Water from Heath Services to the waterboards. The need is	This is an introductory statement to Comments 16.004 to 16.027. See responses to Comments 16.004 to 16.027.	12. General Comment

No.	Comment	Response	Categories
	to add public health as a key consideration in making future state and regional waterboard appointments.		
16.002	Fortunately, key proposed Recycled Water policy changes recognize and address the important role of public health. **The needed policy changes and steps towards needed changes that Friends of the North Fork supports are opposed by the water reuse community.** It goes without saying that deregulation of wastewater recycling is the largely unwritten goal and purpose of the water reuse community and some of their support base. This is nothing new and this activity is no surprise. The many-year unwritten mission of POTW operators and their associations is to deregulate their operations, witness the California Association of Sanitation Agencies that registers staff lobbyists and as a lobbyist employer, and apparently because it may not need to do so, the Central Valley Clean Water Association that does not have a registered lobbyist and is not a registered lobbyist employer. This practice is not unique in California to POTW dischargers. In 1996, for example, the California legislature deregulated the electricity industry.	This is an introductory statement to Comments 16.004 to 16.027. See responses to Comments 16.004 to 16.027.	12. General Comment
16.003	<u>What water pollution regulations, POTW dischargers, and the state and legislature do not make clear and that the legislature may not recognize nor account for.</u> There are a number of Key facts, assumptions and policies that are inadequate, need additions, or largely missing from wastewater, including recycling policy and regulation making.	This is an introductory statement to Comments 16.004 to 16.027. See responses to Comments 16.004 to 16.027.	12. General Comment

No.	Comment	Response	Categories
16.004	**An accurate and fair policy making process needs to mention up front that the Boards are engaged in an historically radical effort to change the ancient goal of keeping wastewater and drinking water separate.** If this were recognized or stated now, the Recycled Water Policy (Policy) and framework for water repurposing would likely change and expand.	The commenter is incorrect in labelling the Amendment as a "historically radical effort." Section 1.1 of the Amendment states the purpose of the Policy is to encourage the safe use of recycled water from treated wastewater sources in a manner that implements state and federal water quality laws and protects public health and the environment. Section 3.1 of the Staff Report describes California's historic recycled water regulations, which date at least to the 1969 passage of the Porter-Cologne Water Quality Control Act. Additionally, California has a decades long history of use of recycled water.	12. General Comment
16.005	**The public is largely uninvolved, uninformed, ineffectively reached out to, and unwelcome to water pollution regulation processes and procedures including policy making.** Informed public is systematically omitted or excluded from water quality regulation and recycling policy making. The USEPA administrator assigned to California NPDES preposterously states that if the waterboards publish public notices and no one comes or the public is not involved, that the Boards have successfully met public involvement requirements. This may dovetail with stated belief on the part of one State Board member. Ironically, a USEPA administration might regard this as reason to withdraw its California NPDES delegation.	See response to Comment 15.006.	12. General Comment

No.	Comment	Response	Categories
16.006	**The water boards are not equipped nor are they required to regulate the impacts of wastewater on the health and content on people and on plants and produce.** The boards continue to have no effective jurisdiction for plant and livestock uptake of wastewater constituents in plants. Board jurisdiction kicks in when water runs off of agricultural fields and operations. And what do those who regulate plant and animal content know about POTW operation? Responsibility for human health came into the Boards ambit when the Division of Drinking Water was transferred from Health to the State Board. Playgrounds, school yards and athletic fields require special public health policy attention. There need to be mechanisms to monitor these for recycled water hazards, and to determine if serious diseases acquired by children, athletes, picnickers and others who come down with serious diseases acquired them from recycled water. Policy should provide in the interim a grass monitoring system that reasonably insures that these hazards do not exist in these awns. However, as reflected in water recycling policy starting in 2009, the State Board appointments, training and hearing comments do not necessarily demonstrate the need to adjust to meet this need. Instead, we have10 years of concern about the health of and the desire to build the water reuse industry and legitimize its ability to sell recycled water.	The Porter-Cologne Water Quality Control Act and Title 22 of the California Code of Regulations (CCR) authorize and require the State Water Board to regulate and control the quality of all waters of the state to protect the health, safety, and welfare of the people of the State and to protect beneficial uses, including agricultural supply. The commenter's request to require a grass monitoring system to monitor for potential recycled water hazards, including to determine a link between disease outbreaks and recycled water application, is not appropriate for inclusion in the Amendment as regulations already exist for the application of recycled water to protect public health. The Title 22, CCR, Uniform Statewide Recycling Criteria were developed explicitly to consider potential risk to human health from recycled water and include monitoring and reporting requirements that ensure protection of public health. The State Water Board implements these criteria. See also section 2.1 of the Amendment.	4. State agency roles

No.	Comment	Response	Categories
16.007	**Water boards don't direct POTWs how to design and build POTWs, but instead rely on the engineer seals on the plans.** Water board members obviously, and some staff including some engineers have little idea what policies and practices are needed to regulate POTW discharges, including discharges that are the source for drinking water. This is because the waterboards have virtually no involvement in directing how POTWs design their treatment plants. An engineer's seal is required. Waterboard staff might have little to no working ongoing responsibility or knowledge about how POTWs work, in effect, POTWs figure out how to meet NPDES permit limits for elements (MCLs) in their discharge without direction from Board staff. Breakdowns that started in1999 took me by the odiferous point of entry of Colfax discharges where Bunch Creek enters the North Fork, demonstrating the Regional Board and City neglect of water quality in the Auburn State Recreation Area. This outrage was dismissed as a concern by executive staff at an environmental group meeting that started me down the path that led to this comment and explains why Friends followed the Board's initial intransigent mis-development of Recycled Water Policy 2008-2009.	The Water Boards regulate the discharges of Publicly Owned Treatment Works (POTWs) and other sources of discharge to protect water quality, public health, and beneficial uses through its NPDES and waste discharge programs. Water Code section 13360 prohibits the Water Boards from prescribing the design, location, type of construction, or manner of compliance with the permit requirements.	4. State agency roles

No.	Comment	Response	Categories
16.008	**The policy does not address protecting water supply systems from contamination and what to do it they are contaminated, including requiring them be replaced.** This needs to include addressing policy liability for recycled water failure and damages. Policy needs to address the Walkerton, Canada incident health impacts and required replacement of the drinking water distribution system.	See response to Comment 16.007. Drinking water supply systems are separately regulated under California Code of Regulations, titles 17 and 22, and require separate permitting and oversight from the State Water Board Division of Drinking Water, which is responsible for the enforcement of the federal and California Safe Drinking Water Acts. A potable recycled water project would, in addition to their waste discharge requirements or NPDES permit (which fall under the purview of the Recycled Water Policy), distribute raw water to an entity permitted for domestic water supply. The domestic water supply permit would include contingencies for a contamination event, such as emergency reserves for drought, regulatory changes, public notice of bacteriological or chemical failures, etc. (Cal. Health and Safety Code §116540)	12. General Comment
16.009	**Drinking water district board and staff training in POTW operations and regulation is needed.** What do the POTW and drinking water districts know about the operation of the other?	Training needs are outside the scope of this Amendment. The State Water Board has extensive training programs through its Training Academy, US Environmental Protection Agency, and other entities to ensure staff possess adequate knowledge, skills, and ability to protect public health and water quality.	4. State agency roles
16.010	**The Policy needs to address the conflict of interest that exists when the recycled water project sponsor is both the wastewater source and the drinking water distributor.**	Comment noted. This comment is outside the scope of the Amendment.	13. Comment out of scope
16.011	**The hazards of recycled water monetization require as much policy clarification as possible.**	Comment noted. This comment is outside the scope of the Amendment.	13. Comment out of scope

No.	Comment	Response	Categories
16.012	Source water California's nascent and ongoing failure to effectively implement the federal Clean Water Act Industrial Pretreatment Program is a classic waterboards failure to regulate water quality, which failings are proposed to be embraced, reinforced and continued in Proposed Policy 10.1.2.: "Agencies should employ source control and/or pollution prevention programs to minimize the likelihood of CECs impacting human health and the environment."	Although some Publicly Owned Treatment Works (POTWs) receive wastewater from both industrial and municipal sources, the General Pretreatment Regulations at 40 CFR 403.1 et seq. establish the responsibilities of government agencies, industries, and the public to implement pretreatment standards to control industrial pollutants that may pass through or interfere with POTWs. While it is the responsibility of the State Water Board to set discharge limits, it is up to dischargers to determine how the conditions and limitations set forth in the General Pretreatment Regulations will be met. In addition, section 10.1.2 of the Amendment is intended to encourage implementation of source control programs, such as the Industrial Pretreatment Program.	10. CECs and Attachment A
16.013	The USEPA delegated the NPDES water pollution control permit program and the Industrial Pretreatment program to California in the same memorandum. The State Board and the Region 5 board have by all actions with which I am familiar, not just abandoned, but through the NPDES program administered by regional boards and the State Board's too limited following of state IPPs, are undermining industrial pretreatment law and regulations.	Section 1.5 of the Amendment states that recycled water is safe for approved uses when it is used in compliance with this Policy, CCR, title 22 and all applicable state and federal water quality laws. CCR, title 22 states that a recycled water proponent must submit a Title 22 Engineering Report and receive approval from the State Water Board prior to permit approval for the recycled water project. The potential for contamination to occur within a water supply and the necessary response to this potential is outlined within the Title 22 Engineering Report, as the report requires a contingency plan which will assure that no untreated or inadequately-treated wastewater will be delivered to the use area as listed in the appropriate permit for the recycled water project.	13. Comment out of scope
16.014	This is an empty policy because it addresses to a certain extent, only monitoring. The fundamental need is to control and regulate POTW source water.	See response to Comment 16.012.	12. General Comment

No.	Comment	Response	Categories
16.015	**Surface Water Augmentation and Direct Potable reuse should not be implemented until the state has in place, effective, and enforced IPP programs.** The Policy needs to require full assessment of POTW, Regional Board, State Board implementation of the IPP including review of all investigations/audits and enforcement, including requiring investigation of whether POTWs under 5 mgd need the implement an IPP. No POTW without an IPP should be considered for any kind of water recycling. Any POTW involved in water recycling needs to be investigated to see if it needs an IPP. POTW NPDES permits need to do far more than require that that a POTW must implement an IPP. POTWs with a POTW General Order like the one adopted by Region 5 should be prohibited from recycling source water. These actions are needed for all POTWs treating over 5 million gallons of wastewater per day because they are supposed to have IPPs, and there needs to be a very low threshold for investigating POTWs that process less than 5 mgd to see if they need an IPP.	Statewide reservoir water augmentation (also referred to as surface water augmentation) regulations have been adopted by the State Water Board and became effective on October 1, 2018. The State Water Board and a 2016 Expert Panel concluded that the regulations would adequately protect public health. The regulations ensure that the treatment is adequately protective of public health, once it is approved by the State Water Board Division of Drinking Water, and they also require continuing monitoring and evaluation to ensure safety throughout operation. Pretreatment may be required in some jurisdictions, but it is not a requirement for all facilities. However, monitoring for CECs is required for all reservoir water augmentation projects, and the State Water Board may require monitoring for additional chemicals. Statewide regulations for direct potable reuse are currently in development, and source evaluation is a key component that is being considered.	9. Permitting for reservoir w. aug.
16.016	The State Board needs to have available including to the public, the document(s): approved as POTW IPPs; making up a POTW's IPP; of all IPP programs that it has certified; copies of any conditions of certification, and of the individual IPP certification approvals. The State Board cannot find a number of its approval documents and has referred us to the IPPs for a copy of their programs. Since IPPs are frequently a combination of municipal code and other documents, it seems to be that the State Board does not have a record of what it approved. This might be enough for the current Administration in Washington to withdraw its IPP delegation. Regional Boards need similar document requirements.	See response to Comment 16.012.	13. Comment out of scope

No.	Comment	Response	Categories
16.017	New staff need to be hired and existing staff and Board members need training in human health, epidemiology, physiology, and risk assessment and its limits.	Comment noted. This comment is outside the scope of Amendment.	13. Comment out of scope
16.018	An irony is that a large part of the Policy is taken up with salts which probably doesn't belong in this Policy about source water from sanitary systems. However, the presence and content about salts demonstrates the Policy's failure to address industrial discharges into POTWs. The Policy language is in many ways inconsistent and confusing, especially because of the language in the IPP. IPP's categorical industries include commercial sources.	See responses to Comments 16.012 and 16.013.	12. General Comment
16.019	**IPP is far more of a traditional regulatory program for POTWs than California has for them which might explain why IPP requirements are ignored and not implemented.** When I speak about IPP to many waterboard staff, I see that I am not being heard; I am faced with absent familiarity. My experience with the Region 5 Board level borders on a collective hostility to IPP. Whereas we had some success advocating for Inflow and Infiltration correction, we have had zero effectiveness on IPP, even though over 20 outfits from our street survey and the Local Hazard Mitigation Plan may need IPP regulation. What we thought was a commitment in an order to do a Colfax collection system-wide IPP investigation was instead recommended to USEPA by the Region 5 board to be an investigation of one industrial user, the Miller-Coors fruit drink distillery that closed the Colfax POTW for 90 days of the first six months of 2015. Roseville which is said to be eligible for substituting the unacceptable General Order for its NPDES permit, is not implementing its IPP. It implies that it doesn't need	See response to Comment 16.012.	13. Comment out of scope

No.	Comment	Response	Categories
	to if it meets its MCLs. And thus it should be prohibited from the General Order and any recycling. The federal IPP has categorical standards for defined dischargers, requires regulating POTW interface and passthrough with local limits. Federal regulations exist.		
16.020	The State Board needs to review the practices, regulation, agenda content (e.g., listing each research and grant funding on its agendas), what is delegated to staff, transparency in management committee decisions, and public involvement of state agencies that do regulate practices at the interface of regulated actions. IPP seems to me to be the lynchpin of both existing Board limitations and improving waterboard regulatory culture.	See response to Comment 16.013.	13. Comment out of scope
16.021	<u>The Policy does too little to provide policy when monitoring suggests or requires the need to shut down the source water use</u> The state and regional water boards do not direct how POTWs are designed, so it is to be expected that they know little about how to regulate them as sources of drinking water. The Policy has far too little about the mechanisms needed to safely regulate water repurposing which is described as water recycling.	See responses to Comments 16.006 and 16.007. CCR, title 22 regulates the safe use of recycled water, including source water protection and operator certification. Additionally, the regional water boards and drinking water districts track compliance with permit requirements and have the authority to take any appropriate enforcement actions in instances of noncompliance.	4. State agency roles
16.022	Coastal lagoon definition may be inadequate for lagoons that are very infrequently breached.	The definition of coastal lagoons and estuaries is consistent with the Water Quality Control Plan for Ocean Waters of California.	14. Definitions
16.023	Executive Officer granted exceptions see to be unqualified, unconstrained and with little or no public involvement.	The Amendment does not grant the Executive Officer any more authority than is allowed under the California Water Code.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
16.024	A new draft should be issued for comment	See response to Comment 15.006.	12. General Comment
16.025	On a note based on personal experience after working on the staff of California State Senate five hears and New York State Assembly for over nine years, it seems to me that AB 574 requires serious catch-up by the legislature.	Comment noted. This comment is outside the scope of the Amendment.	13. Comment out of scope
16.026	We disagree with the narrative goal to minimize direct discharge of treated wastewater. Instead, direct discharge should continue unless it is proven that there is no existing environmental and public health including beach safety need for the discharge. This policy needs assure to that the different factors involved between short length and long length POTW ocean discharge conveyances are recognized and addressed.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
16.027	We oppose removing the requirement to monitor priority pollutants in recycled water used for landscape irrigation. Brenda Aleman documents the necessity to keep these limits and to better regulate this use.	See response to Comment 23.004.	7. Permitting for Non-potable
17	**General Public** **Commenter: Anthony Serrano**		
17.001	I support the use of "recycled water" but the current policy does not include any provision to: 1. justify any proposed wastewater project to generate recycled water based on any given financial analysis i.e. rate of return or debt margin, 2. does not include any post audit provision of the proposed project (after the project is completed and operational as in any given engineering related project) to validate the original justification of the project, or 3. any provision for a financial penalty on the party who	The Recycled Water Policy is a policy for water quality control adopted pursuant to Water Code section 13140. Economic analyses, audit provisions, and financial penalty provisions for specific recycled water projects are outside the scope of the Policy. The purpose of the Policy is to streamline permitting for recycled water projects and encourage recycled water use while protecting the environment and public health. Cost justifications would be conducted for individual recycled water projects, to evaluate economic and financial feasibility of the project, including projected costs (e.g.,	13. Comment out of scope

No.	Comment	Response	Categories
	submitted the application to construct the wastewater project to generate recycled water.	capital, operations and maintenance, avoided), projected revenue, and benefits, rather than through the permitting process.	
17.002	The State of California has a series of state agencies to provide "checks and balances" to make sure taxpayer monies are spent in a responsible manner: 1. State of California State Administrative Manual (SAM), 2. State of California Auditor, 3. State of California Department of Water Resources internal audit unit, and 4. State of California Government Code §13400 - § I 3407 known as the "Financial Integrity and State Manager's Accountability Act of 1983."	Comment noted. This comment is continuation of Comment 17.001.	13. Comment out of scope
17.003	**1. On page 1 of the Draft Amendment, Section 1. Purpose insert a new provision as "1.6" for:** "The designated proponent or permittee will submit a cost justification statement and supporting calculations (to be developed) with a reasonable rate of return (to be developed) for the wastewater project to generate recycled water. The cost justification statement will comply with the Department of Water Resources Internal Audits Office requirements (to be developed) and consistent with the "Financial Integrity and State Manager's Accountability Act of 1983." The cost justification statement to be signed under penalty of perjury,	See response to Comment 17.001.	13. Comment out of scope

No.	Comment	Response	Categories
17.004	**2. On page 1 of the Draft Amendment, Section 1. Purpose insert a new provision as "1.7" for:** " The designated proponent or permittee will submit a " ramp-up for all capital and human resource costs" statement and illustration chart for the term of the project. The " ramp-up" will comply with the Department of Water Resources Internal Audits Office requirements (to be developed) and consistent with the "Financial Integrity and State Manager's Accountability Act of 1983." The ramp-up statement to be signed under penalty of perjury,	See response to Comment 17.001.	13. Comment out of scope
17.005	**3. On page 1 of the Draft Amendment, Section 1. Purpose insert a new provision as "1.8" for:** "The designated proponent or permittee will submit an "amortization schedule" (if a 30-year project then inclu de a line item for each of the 30-years) listing all capital, annual operational, and human resource costs for the term of the project. The "amortization schedule" will comply with the Department of Water Resources Internal Audits Office requirements (to be developed) and consistent with the "Financial Integrity and State Manager' s Accountability Act of 1983." The amortization schedule statement to be signed under penalty of perjury,	See response to Comment 17.001.	13. Comment out of scope
17.006	**4. On page 1 of the Draft Amendment, Section 1. Purpose insert a new provision as "1.9" for:** " The designated proponent or permittee will subject to the annual audit for the project during the term of the project and will comply with the Department of Water Resources Internal Audits Office requirements (to be developed) and consistent with the "Financial Integrity and State Manager's Accountability Act of 1983." If the project fails to meet the original cost justification statement, then the proponent or permittee will be subject to a financial penalty to offset the loss of taxpayer monies incurred by the project.	See response to Comment 17.001.	13. Comment out of scope

No.	Comment	Response	Categories
17.007	I am familiar with a current AND local wastewater treatment facility "Sterling Natural Resource Center" that received approval for funding on May 24, 2018 but does not include any: 1) cost justification statement, 2) ramp-up schedule, or 3) an amortization schedule?	Funding approval for the Sterling Natural Resource Center is not within the scope of the Amendment. See also response to Comment 17.001.	13. Comment out of scope
17.008	1. The local ratepayer in the community WILL NOT get any of the proposed "recycled water" because it is drained directly into the Santa Ana River from the proposed $126M facility. Part of the original justification for the proposed wastewater treatment facility... the local community was told we would have RECYCLED WATER...as of the June 2017 Draft Engineering Report we now know the local community WILL NOT have the use of the RECYCLED WATER, but the local ratepayer is on the hook to repay the $126M to build the Sterling recycle water plant! 2. Issues raised at a Public Comment Hearing in July 2017 for the June 2017 Title 22 Draft Engineering Report to demonstrate how the Project complies with the California Code of Regulations (CC R) Title 22, Division 4, Chapter 3, Water Recycled Criteria (CCR, 2014). Article 7, §60323 were memorialized in the August 1, 2017 Board Minutes for the San Bernardino Valley Municipal Water District (SBVMWD) but the answers to the written questions submitted have NEVER been answered, 3. In the June 2017 report by consultants RMC Water and Environment (RMC) with support from John Robinson Consulting, Inc. and GEOSCIENCE Support Services, Inc. advised on pages 6-1 (see attachment), Section 6.1 City Creek:"..... *The creek only flows periodically in response to rainstorm events. Since the channel bottom is unlined and runs over the unconsolidated sandy sediments of the Bunker Hill*	Comment items 1 and 2 address specific details of the Sterling Natural Resource Center and are not within the scope of the Amendment. Follow up on past public hearing comments and site-specific Title 22 Engineering Report questions can be directed to the local water district involved and State Water Board Division of Drinking Water staff. In general, the State Water Board Division of Water Rights addresses site-specific issues concerning water allocation under Water Code section 1211, a regulatory process separate from the proposed amendment. Comment items 3-6 are not within the scope of the Amendment. A losing stream has reaches where the water table is below the streambed, causing water to infiltrate the ground and recharge groundwater resources. The contribution to groundwater storage aligns with the Water Recycling Funding Program project objectives.	13. Comment out of scope

No.	Comment	Response	Categories
	Groundwater Basin, this portion of City Creek is likely a "losing stream". A losing stream is condition where a significant percentage of surface flow will infiltrate into the unsaturated zone, ***potentially reaching the water table,"*** 4. This is the location where the proposed "recycled water" is to be drained back into the Santa Ana River.....but this is a "loosing stream!!!" The recycled water will evaporate and never get back into the groundwater basin! 5. How do you "POST AUDIT" recycled water that never reaches the water table??? $126M later, and 6. The May 24, 2018 funding notice stated in part the following: *" The funding comes from the Water Recycling Funding Program (WRFP) through a combination of Clean Water State Revolving Fund (CWSRF) and Prop 1 Water Bond 2014 Funds. CWSRF provides low-interest loans to public agencies for planning, design, and construction of water recycling projects. Proposition 1 loans and grants are part of the $625 million recycled water project funding secured by voters in the 2014 Water Bond. To receive WRFP funding, projects must go through an extensive application and contribute to surface and groundwater storage, ecosystem restoration, or drinking water protection. "*		
18	**General Public** **Commenter: Anthony Serrano**		

No.	Comment	Response	Categories
18.001	Thank you for taking the telephone call this morning, discussing SIMILAR COST related issues in Report 2017-118 to the pending $126M construction and $3.3M annual operating expense for the "Sterling Natural Resource Center wastewater treatment" project, the associated June 2017 Title 22 Draft Engineering Report raises serious concerns that the draining of recycled water back into the Santa Ana River will actually arrive into the Basin's water table which is the main/alleged benefit to the community, and an after-the-fact audit report sometime into the future is not acceptable because the community believes the "CONSULTANT's Report" that the concept will not work at the City Creek location.	See response to Comment 17.008.	13. Comment out of scope
18.002	Based on this information, we believe the State Auditor should be pro-active and submit their own "Public Inquiry" prior to Tuesday, June 26, 2018 at 12:00 noon for the **"Public Comment-Amendment Policy for Water Quality Control for Recycled Water"** and determine if the Water Boards is following the provisions of **"The Financial Integrity and State Manager's Accountability Act of 1983" Government Code 13400 - 13407 in managing "Recycled Water Policy."**	Comment noted. This comment is outside the scope of the Amendment.	13. Comment out of scope
18.003	Please consider the following: **1. Report 2017-118** - the "cost" related issues with the State Auditor's 1-page Report 2017-118 (copy attached) and the recommendations/findings submitted to the State Water Boards, **2. The Financial Integrity and State Manager's Accountability Act of 1983** - it appears the State Water Boards does not require complete compliance with California Government Code Section 13400-13407 Chapter 5, in their managing certain programs	Comments noted. This comment is outside the scope of the Amendment.	13. Comment out of scope

No.	Comment	Response	Categories
	that can affect costs imposed on citizens, taxpayers, and local ratepayers, **3. Public Comment Due 6-26-2018 at 12:00noon** - the Water Boards is currently considering **"Amendment Policy for Water Quality Control for Recycled Water"** and it appears the Water Boards does not include the provisions of **The Financial Integrity and State Manager's Accountability Act of 1983** in managing " Recycled Water" related projects that can cost more than $126M to construct with $3. 3M a year to operate, 4. A current "Recycled Water" project titled: ***"Sterling Natural Resource Center (wastewater treatment facility)"*** that received approval for funding ($126M) by the Water Boards on May 24, 2018 and after numerous hearings and a most recent hearing before the San Bernardino County Local Area Formation Commission (LAFCO) on June 20, 2018 did not include any of the following construction related financial documents: a) "cost-benefit justification" with any financial analysis i.e. rate of return or debt margin, b) " post-audit provision" associated with most engineering related construction projects to insure the original cost-benefit of the proposed project was achieved, c) " ramp-up" statement and illustration chart for annual capital costs, maintenance costs, and human capital costs for the term of the contract i.e. 20 years, 25 years etc. d) "amortization schedule" for the term of the contract i.e. 20 years, 25 years etc. listing principle and interest charges and copy supporting loan documents, e) "construction cost over-runs" and how these costs will be funded.		

No.	Comment	Response	Categories
18.004	**PROBLEM** In addition to the lack of "financial" documents to support the project, we have an additional problem with the actual "operational plan" described by three (3) private consultants who prepared the "June 2017 Title 22 Draft Engineering Report to demonstrate how the project complies with the California Code of Regulations (CCR) Title 22, Division 4, Chapter 3, Water Recycled Criteria (CCR, 2014). Article 7, §60323" because: **1. Consultant's Findings** - In the June 2017 report by consultants RMC Water and Environment (RMC) with support from John Robinson Consulting, Inc. and GEOSCIENCE Support Services, Inc. advised on pages 6-1 (see attachment), Section 6.1 City Creek: " .....*The creek only flows periodically in response to rainstorm events. Since the channel bottom is unlined and runs over the unconsolidated sandy sediments of the Bunker Hill Groundwater Basin, this portion of City Creek is likely a "losing stream". A losing stream is condition where a significant percentage of surface flow will infiltrate into the unsaturated zone,* ***potentially reaching the water table,"*** **2. LOOSING STREAM** - This is the location where the proposed "recycled water" is to be drained back into the Santa Ana River.....but this is a "loosing stream!!!" The recycled water will evaporate and never get back into the groundwater basin! **3. Public Comment Hearing July 2017** - The August 1, 2017 Board Minutes for the San Bernardino Valley Municipal Water District (SBVMWD) memorialized the questions submitted for public comment but the answers to the written questions submitted have NEVER been answered, and	See response to Comment 17.008. For clarification on comments 1 and 2, a losing stream has reaches where the water table is below the streambed, causing water to predominantly infiltrate the ground and recharge groundwater resources. The water in this system is expected to contribute to the groundwater and not evaporate as suggested in the comment. Comment item 3 is not within the scope of the Amendment and inquiries on local water district board meetings can be directed to the specific local agency involved. With respect to comment 4, the State Water Board complies with the Financial Integrity and State Manager's Accountability Act of 1983, renamed the State Leadership Accountability Act in 2015, by reviewing internal control and monitoring systems on a biannual basis. Publicly available reports contain information meeting the requirements of the law.	13. Comment out of scope

No.	Comment	Response	Categories
	4. Compliance Issue- We need the Water Boards to comply **with The Financial Integrity and State Manager's Accountability Act of 1983, as it relates to Policy for Water Quality Control for Recycled Water**		
18.005	**REQUEST** We request the State Auditor's office do the following: 1. submit a " Public Comment" prior to Tuesday, June 26, 2018 at 12:00 noon deadline for the **"Public Comment - Amendment Policy for Water Quality Control for Recycled Water"** and 2. determine if the Water Boards is following the provisions **of "The Financial Integrity and State Manager's Accountability Act of 1983" Government Code 13400-13407 in managing "Recycled Water Policy."**	Comment noted. This comment is outside the scope of the Amendment.	13. Comment out of scope
19	**General Public** **Commenter: Anthony Serrano**		
19.001	Thank you for the opportunity to submit comments, I support the use of “recycled water” but the current policy does not require the following items, for proposed wastewater treatment facilities, BEFORE funding is approved for the project: 1. A completed and approved Title 22 Engineering Report to demonstrate how the Project complies with the California Code of Regulations (CCR) Title 22 Recycled Water. The code requires the Engineering Report to be submitted to the State Water Resources Control Board and the Regional Water Quality Control Board for approval prior to producing recycled water for reuse from a water reclamation plant. The purpose of the Engineering Report is to request regulatory	State Water Board Division of Financial Assistance funding guidelines require a permit to be in place prior to disbursing funds to a recycled water project, and a Title 22 Engineering Report must be approved prior to regional water board issuance of a permit. Compliance with the local, state, and federal laws and regulations are required for all projects.	11. Permit review and update

No.	Comment	Response	Categories
	approval for the Project and to form the basis for its NPDES permit,		
19.002	2. Prior to submitting the DRAFT Engineering Report for approvals will include a record confirming all "Public Comments/Questions" have been responded to in writing and included,	The requirements for a Title 22 engineering report are contained in Sections 60301 through 60355 of CCR, title 22 and do not require a public comment process.	13. Comment out of scope
19.003	3. The DRAFT Engineering Report submitted for approvals will include financial supporting documents for the following: a) cost-benefit analysis with rate of return, b) amortization schedule for term of the loan repayment period and copy of loans documents, c) ramp-up schedule for term of the loan listing the annual capital costs, maintenance costs, and human capital costs, and d) post-audit schedule to evaluate if the cost-benefit of the project was achieved and within budget, 4. The financial documents listed will be signed under penalty of perjury for each of the following: cost-benefit analysis with rate of return, b) amortization schedule for term of the loan repayment period and copy of loans documents, c) ramp-up schedule for term of the loan listing the annual capital costs, maintenance costs, and human capital costs, and d) post-audit schedule to evaluate if the cost-benefit of the project was achieved and within budget, and 5. The Policy will include a financial penalty to insure the local ratepayer will be reimbursed, by the Manager and Board Members of the water district, if the Project fails to pass the financial document for: d) post-audit schedule to evaluate if the cost-benefit of the project was achieved and within budget. The ratepayer should not be required to repay a construction loan or suffer from increased monthly rates for service if	See response to Comment 17.001.	13. Comment out of scope

No.	Comment	Response	Categories
	management has delivered a poor wastewater treatment facility.		
19.004	Based on this information, the Policy should be that NO proposed wastewater treatment facility can be funded PRIOR to a Title 22 Engineering Report is approved by the State Water Resources Control Board and the Regional Water Quality Control Board.	See response to Comment 19.001.	13. Comment out of scope
20	**General Public** **Commenter: John Moore**		
20.001	This is an Addendum to my Comment Letter dated June 11, 2018. It adds a letter that I sent to the Seaside Basin Watermaster (an adjudicated Basin) re-stating its technical adviser that the PWM is in fact a DPW into a drinking water repository.	Comment noted. This comment is outside the scope of the Amendment.	13. Comment out of scope
20.002	I have also added Scan 110, a back and forth between WRAMP a party to the CPUC case dealing with PWM and with PWM and with PWM wherein PWM confesses to several important issues: First, it agrees that recycled agriculture wastewater has never been mixed with sewage waste for potable purposes.	The comment refers to details of a specific recycled water project, Pure Water Monterey, which is out of the scope of the Amendment.	8. Permitting for GWR
20.003	Then, PWM does not add any health tests. We are an experiment. One could only imagine the testing that would be required by the FDA, or recommended by a true expert about these issues (like the SAP group).	See response to Comment 20.002. This comment is outside the scope of the Amendment.	13. Comment out of scope

No.	Comment	Response	Categories
20.004	My point is that the proposed regs. Do not require verifications by the DDW or its Engineering Dept. PWM says it is a IPR w/o any evidence, hires a environmental consultant with zero expertise in health issues, and the Engineer, DDW and the Regional Waterboard buys into it. Other districts will mimic this flawed process.	See response to Comment 20.002. This comment is outside the scope of the Amendment.	13. Comment out of scope
21	**General Public** **Commenter: John Moore**		
21.001	1. The proposal is unrelated to the politics that demonize the characterization of a real Ca. Recycling project and it does not require verification of the truthfulness of the sponsoring agencies. As a result, PWM, for just one example represented to the Regional Board and the Dept. of Drinking Water(DDW), that the PWM project was/is an Indirect Potable Reuse (IPR), but nothing could be further from the truth. The only evidence about whether the project was/is an IDP or a Direct Potable Reuse (DPR) is Letter M from the EIR, attachment 101, a letter by the Technical Program Manager of the Seaside Basin Watermaster (an adjudicated basin). He is in charge of the day to day operations of the basin in accepting drinking water into the basin and permitting owners of the water to extract their share. The letter proves that the PWM project is a DPR project and it did not qualify for a permit as an IDP. So what was the misrepresentation by PWM? It claimed that because the water was required to sit in the Basin for two months, that constituted a Barrier that qualified the project as IDP; in short, per PWM the final delivery of the treated water to a well or basin is also a barrier. While the water does obtain minimal dilution in	See response to Comment 20.002. This comment is outside the scope of the Amendment.	13. Comment out of scope

No.	Comment	Response	Categories
	the basin, there is no leeching thru sands, several aquifers, extreme dilution etc. for five years, like the Orange Water District IDP project. PWM says, well the two months will allow it to test the water for that time. But if it is not a barrier, the required tests are for a DPR, and those tests are a part of this process, i. e., under development. In Exhibit M, the Technical operator, Bob Jaques, made some telling points: First, In para 1. he notes that all water injected into the basin will be extracted shortly thereafter. So it is not a cleansing barrier that could qualify as an IDP. Second, he noted in para. 8 that two of the new water sources, Blanco Drain and the Reclamation Ditch both have a high level of contamination, a broad spectrum of pesticides, as well as metals and bacterial organisms. He then said: "The design of the GWR Project Treatment Facilities should address this in order to ensure that the plant is reliably able to produce water of suitable quality for 'direct injection' (emphasis mine) into the SGWB, 'which serves as a potable water supply to the public' (emphasis mine)." But, there are no DPR tests; that is what this process is about. Mr. Jaques has just informed me that the tests required before treated water may be injected into the basin by PWM will be dictated by the DDW. But of course, as set forth above, PWM expects to apply the current tests for an IDR.		
21.002	I note that the proposed definition of a Barrier set forth in the proposed regulations would prohibit the PWM project from qualifying as an IDR.	A definition for Barrier is not included in this Amendment and it is unclear to which section of the Amendment the commenter is referring. See also response to Comment 20.002.	14. Definitions
21.003	The proposed Regulations do not deal with a PWM situation where two highly toxic but different water sources are mixed before treatment (human sewage from the city of Salinas and highly toxic agriculture waste). There is not even an IDR example of the	See response to Comment 20.002. Proposals for specific indirect potable reuse projects are reviewed and considered by regional water boards and the State Water Board Division of Drinking Water on a case-by-case basis.	13. Comment out of scope

No.	Comment	Response	Categories
	recycling of agriculture waste for potable purposes, anywhere, let alone mixing it with sewage without any examination by trained toxicologists about the toxic effects of that mixing. Because PWM claims IDR status, there are no specific tests for this unique mix after treatment and before injection into the water supply. But there are several additional reasons(below) that comprehensive testing must be required before treated water from severely toxic sources (like PWM) is mixed with other drinking water.		
21.004	Another criticism is that the proposed regulations imply that the Experts Report concluded that DPR can now be allowed on a case by case basis pursuant to the proposed regulations. A careful reading of that report implies that significant research and development must be concluded before DPR is permitted. The caveats by the experts are many and well founded.	The Amendment does not refer to direct potable reuse or any requirements that direct potable reuse be allowed on a case by case basis. The commenter may be referring to Water Code section 13523, under which the regional water board may consider requirements for recycled water projects, including direct potable reuse projects, on a case-by-case basis if they are not addressed by the Uniform Statewide Recycling Criteria, i.e., established regulations for the use of recycled water. Water Code section 13561.2 requires the State Water Board to adopt uniform water recycling criteria for direct potable reuse through raw water augmentation by December 31, 2023 unless an expert panel does not adopt a finding that the proposed criteria would adequately protect public health. Research recommended by the 2016 Expert Panel is underway and is expected to be complete prior to the adoption of regulations for direct potable reuse via raw water augmentation.	12. General Comment

No.	Comment	Response	Categories
21.005	If you are still reading this, you may be thinking, "yes, in fairness, the PWM project is quite challenging." Let me add to the drama and additional reasons that the project is unsafe. The Seaside Basin, the repository of the treated drinking water is located in Fort Ord a sandy, former U.S. Army base. The Basin sits below a Super Fund Toxic site that has decades of Infantry, tank and Artillery training, going back to pre-WWII. I attach a few pages from Letter S (Scan 106) to the project EIR that details the toxic sources. After heavy rains, water on the two Ft. Ord golf courses disappears within a few hours. Where does it go? The Basin is located in several earthquake faults, including the San Andreas fault. Because of the sandy soils, liquifaction of water-laden sediments (the soil turns into liquid) in the vadose zone (the soil from the basin to ground level) could contaminate the basin with Fort Ord debris, chemicals and whatnot. There is no alternate source of water. I refer you to attachment 104, from the proposed regs. 5.2.4.8. " Peak Attenuation of Short Term Pulses of Chemicals Likely to Persist Through Advanced Treatment." The section has to do with unexpected events, like an industrial spill and questions how this might (or not) work. It concludes with: "How this would Work is a research Question?" In the case of the PWM DPR project, we bloody well better get on that, or babies will die!	See response to Comment 20.002. This comment is outside the scope of the Amendment.	13. Comment out of scope

No.	Comment	Response	Categories
21.006	I refer you to attachment 100. It is a 2016 comment letter from the three toxicology scientist that were on the 2010 Science Advisory Panel (SAP). The comment was because the proposed regs. did not adopt Bioassays as part of the safety tests for DPR and as set forth in the letter they made compelling arguments that in vivo bioassay testing is critical if DPR is to produce safe drinking water. In vivo is expensive, because it involves assaying live organisms from live animals. It actually assays a cell and identifies discrete parts for pathogens (in vitro tests dead samples and is not as helpful). Now that you have been exposed to real life, the PWM project, you should reconsider the omission of in vivo bioassay tests. Could any sane adult allow treated wastewater from the PWM project to be injected into the drinking water of the Seaside Basin w/o in vivo bioassay testing? I am a rate payer and I say, get those tests. We will pay for them. BTW, the credentials of the three SAP members are very impressive. Listen to them.	Regulations for direct potable reuse, or treated drinking water augmentation, have not been developed. The State Water Board will develop the treated drinking water augmentation regulations through a public process and encourages the commenter to engage in the process. Attachment A requires a recycled water producer to monitor using two bioanalytical screening tools (ER- α and AhR) for groundwater recharge and reservoir water augmentation recycled water projects.	10. CECs and Attachment A
21.007	I refer you to attachment 105. It is the face page of the DDW acceptance of the Final Engineering Report for the PWM project. para, 1. confirms that approval was granted on the assumption that the project was in fact an IPR project in fact, not one just based on a trick, claiming that a repository of treated drinking water was an IPR qualifying barrier.	See response to Comment 20.002. This comment is outside the scope of the Amendment.	13. Comment out of scope

No.	Comment	Response	Categories
21.008	The wealth of opinions from the experts that study the Toxicology of recycled wastewater is that neither IPR nor DPR is safe. I could attach dozens of examples, but will limit it to Scan 107, which is typical. Can you imagine how such experts would react to the PWM project. But of course the agencies pursuing such dangerous projects never hire honest qualified experts. The safety expert for the PWM EIR prepared a written report that based her opinion on asserted examples of projects and studies that she argued showed that the PWM process was safe. Not a single existing project had source water as toxic as the PWM sources. As for studies, she cited the Rand study which showed a 73% increase in liver cancer by those that drank recycled water as an article positive to the PWM project. I checked her company out in Dun and Bradstreet: at the time of her EIR report she had two employees, she and her mother.	See responses to Comments 20.002 and 21.009.	12. General Comment
21.009	There is a very critical factor missing from the proposed regs. The standards in the Regs must be so secure about the recycled water's safety for potable purposes that forced users like me do not need to worry about the safety of the water. They are not close. At this time very few of the forced users of the PWM mix are even faintly aware of the dangerous PWM project. Cal Am has informed me that there will not be a source of water free from the PWM mix. There was no vote and when the true nature of the project becomes public, chaos should result. What adds to the insult is the human waste and agriculture wastewater sources come from areas outside the Cal Am water district, so their residents will not be forced to drink the worrisome mix. WE ARE ENTITLED TO KNOW THAT OUR DRINKING WATER IS SAFE! As Dr. Oppenheimer stated, it may be years before the toxicity is discovered. A recent report about the	See response to Comment 20.002. Additionally, section 2.1 of the Amendment states, “when used in compliance with this Policy, California Code of Regulations, title 22 and all applicable state and federal water quality laws, the State Water Board finds that recycled water is safe for approved uses, and strongly supports recycled water as a safe alternative to fresh water or potable water for such approved uses.”	12. General Comment

No.	Comment	Response	Categories
	Michigan contamination of the seventies, indicates that even three generations after actual exposure to the public in the seventies, the toxic effects continue to show in the subsequent generations, though they were not actually exposed to the contaminants.		

No.	Comment	Response	Categories
22	**Glendale Water & Power** **Commenter: Michael E. De Ghetto, P.E.**		
22.001	I have three comments and have numbered them below. In each comment I have also provided a scenario to help provide context for the comment.	This is a leading statement to Comments 22.002 and 22.003.	12. General Comment
22.002	Allowing "discharges to the waters of the United States" for tertiary-treated recycled water system discharges for essential operations, maintenance activities, and emergency discharges, following best management practices and the applicable discharge permit requirements, if one is in place, would be a beneficial change that would provide a similar level of protection as the General Permit for Drinking Water System Discharges. The example scenario is a recycled water main break that drains to the same channel or tributary channel where the water reclamation plant that is the source of the recycled water has an NPDES permit to discharge to that same channel. In this case, the City of Glendale's recycled water is generated at the Los Angeles-Glendale Water Reclamation Plant, which has an NPDES permit to discharge to the LA River. All of Glendale's service area drains into the LA River or the Verdugo Wash which is a tributary channel to the LA River channel. However, the requirements for maintenance and repair of the recycled water system is similar to untreated waste-water, instead of tertiary treated water that is permitted for discharge at a different point in the same channel.	The requested change was not made. Pursuant to the Federal Water Pollution Control Act, discharges to waters of the United States can only be permitted through the National Pollutant Discharge Elimination System (NPDES) program. Water quality control policies, such as the Recycled Water Policy, cannot supersede federal permitting requirements for waters of the United States.	12. General Comment

No.	Comment	Response	Categories
22.003	Adding a definition for a "project" would help clarify and streamline statewide consistency for permit requirements for recycled water. Specifically, a project could be defined as, new recycled water distribution systems or treatment facilities, new recycled water uses within an existing system that were not already permitted, or new recycled water system extensions that connect new portions of an agency's service area onto the recycled system. The intent for many of the proposed changes appears to be to ensure safe use of recycled water for new uses and new recycled water systems, and to ensure that large reductions to historical flows in receiving waters is properly analyzed and accounted for. The current wording addresses those items, but restricts normal day-to-day use of existing recycled water systems that were installed originally as "projects" themselves. As currently proposed, a retail customer would actually avoid the use of recycled water due to the delays in permitting, and instead use potable water for toilet flushing, and irrigation, in order to have certainty in their ability to receive service and complete their facility redevelopment or upgrade. Ultimately, this could lead to fewer and fewer recycled water users and an increase in potable water use, as parcels and facilities are redeveloped in areas that already have recycled water systems. One example scenario is the redevelopment of an existing building that is adjacent to an existing recycled water main. The original building did not have a recycled water connection and will be demolished with a new building built in its place. Ideally the new building would use dual-plumbing and have a dedicated recycled irrigation meter for its courtyard. Since retail customers come on and off an existing	A definition for "project" is included in Public Resources Code §21065 and is therefore not included in the Amendment. Projects seeking streamlined permitting and seeking to enroll new users quickly in a recycled water program are encouraged to seek coverage under Order WQ 2016-0068-DDW or Master Recycling Permits, which offer streamlined enrollment options so that new users can be more quickly permitted. The comment that "retail customers come on and off an existing recycled water system, just like a potable water system, "it seems that this would not be a "recycled water project" but instead simply the connection of new customer to an existing permitted system" is correct so long as the existing system is permitted to authorize the type of use intended by the retail customer. In most cases it is the owner or operator of the recycled water system that would have the permit, typically in the form of water recycling requirements or a master recycling permit.	14. Definitions

No.	Comment	Response	Categories
	recycled water system, just like a potable water system, it seems that this would not be a "recycled water project" but instead simply the connection of new customer to an existing permitted system. The proposed changes don't make this distinction, making it difficult at the retail water service level to utilize existing, permitted, infrastructure. Another example scenario is a Junior College that has existing dual plumbed buildings. The college has funding to renovate one of their other buildings and plans to use dual plumbing. This is a normal retail level connection to an existing customer that has already done an engineering report for dual plumbed use. Ideally, renovation of another building at the same facility would not require an additional engineering report nor a change petition and would not be considered a "recycled water project," but instead a connection to an existing permitted system with an already permitted use.		
23	**Heal the Bay** **Commenter: Annelisa Ehret Moe**		
23.001	Heal the Bay is a nonprofit organization with over 15,000 members dedicated to making the coastal waters and watersheds of Greater Los Angeles safe, healthy, and clean. On behalf of Heal the Bay, I respectfully submit the following comments on the Amendment to the Policy for Water Quality Control for Recycled Water (Recycled Water Policy). The use of treated wastewater for beneficial purposes is essential to reach water sustainability in a semi-arid state such as California. With the recent passing of two State Bills, SB 606 (Hertzberg) and AB 1668 (Friedman), state legislators have recognized the need for permanent water conservation efforts throughout	This is the introductory statement to the comment letter, followed by Comments 23.003 to 23.009.	12. General Comment

No.	Comment	Response	Categories
	California, even in non-drought years. The State Water Resources Control Board (State Board) supports an increased use of recycled water in order to reach these water sustainability goals, stating that "… it is the intention of the legislature that the state undertake all possible steps to encourage development of water recycling facilities so that recycled water may be made available to help meet the growing water requirements of the State"[1]. Heal the Bay commends the State Board for their efforts to maximize the safe use of recycled water in a way that is protective of public and environmental health.		
23.002	However, we have a few remaining concerns with the goals and requirements presented in the Proposed Amendment to the Recycled Water Policy. In order to truly maximize the use of recycled water while maintaining protection for public and environmental health, we recommend that the State Board make the following revisions to the Policy for Water Quality Control for Recycled Water: • Eliminate direct discharge, except where necessary to maintain beneficial uses • Maintain water quality monitoring necessary for intended purposes • Maintain stringent implementation and regulation requirements for Salt and Nutrient Management Plans (SNMPs) • Require adaptive management to address Contaminants of Emerging Concern (CECs)	This is the introductory statement to the comment letter, followed by Comments 23.003 to 23.009.	12. General Comment

No.	Comment	Response	Categories
23.003	These recommendations are explained in further detail below. **The goal of the Recycled Water Policy must be to *eliminate* the direct discharge of treated water to closed bays, estuaries and coastal lagoons, and ocean waters, except where necessary to maintain beneficial uses.** The goal of the Recycled Water Policy is to minimize this discharge. However, any direct discharge of recycled water is a waste of our water resources, which could be allocated for beneficial use. Currently approved uses for treated wastewater include non-potable reuse (e.g. irrigation) and indirect potable reuse (e.g. groundwater recharge, seawater intrusion barriers, etc). There are efforts in motion to allow for direct potable reuse of recycled water in the future, as well. With so many potential beneficial uses for treated wastewater, it is essential that we eliminate direct discharge of this valuable resource, except when direct discharge is necessary to maintain beneficial uses, such as biological habitat to support native species.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
23.004	**We must ensure that recycled water is treated to the extent necessary for its intended purpose, so that we can protect public and environmental health while we maximize recycled water use.** The proposed amendment to the Recycled Water Policy would remove priority pollutant monitoring requirements for certain non-potable beneficial uses, such as irrigation. However, contaminated water used for irrigation can negatively affect healthy soil, and potentially contaminate our groundwater resources, if irrigation water is able to percolate down to the water table. Therefore, we must maintain priority pollutant monitoring requirements, even for non-potable irrigation beneficial uses. While we do encourage increased use of recycled water, California cannot	Priority pollutant monitoring was removed from the Policy for several reasons. CCR, title 22, Div. 4, Ch.3. §60310 states, “any irrigation runoff [of recycled water] shall be confined to the recycled water use area, unless runoff does not pose a public health threat and is authorized by the regulatory agency.” This prohibition of recycled water leaving the use area is a requirement of all irrigation recycled water projects and minimizes the potential for recycled water to impact water quality. In addition, section 7.5 of the Amendment was modified to state that incidental runoff of recycled water shall not result in water quality less than that prescribed in water quality control plans or policies. This ensures that in the event of small amounts of discharge leaving the use area, the recycled water project is prohibited from impacting beneficial uses. Furthermore, site-	7. Permitting for Non-potable

No.	Comment	Response	Categories
	become a sustainable state unless we also protect public and environmental health.	specific monitoring for specific constituents of concern, such as priority pollutants, is prohibited for non-potable recycled water projects pursuant to section 7.4 of the Amendment unless recycled water is applied in a manner that could negatively affect water quality, including groundwater quality. Examples of this include application of recycled water to unlined ponds, application of recycled water at rates that do not minimize percolation to the water table, application when soils are saturated, or application to areas with shallow aquifers (5' or less). If any of these circumstances occur or if the regional water board finds other unusual circumstances apply, the regional water board may prescribe groundwater monitoring, including monitoring for priority pollutants. Additionally, the Amendment removes priority pollutant monitoring requirements only for landscape irrigation projects. Potable reuse projects, such as groundwater recharge and reservoir water augmentation projects, are separately required to monitor for priority pollutants under CCR, title 22. Lastly, staff analyzed available priority pollutant monitoring data for tertiary-treated recycled water facilities (i.e., the required level of treatment for landscape irrigation) and found a very low occurrence of priority pollutants in five years of data. See section 4.9.1 of the Staff Report with SED for additional explanation.	
23.005	**The implementation and regulation of a SNMP must be required, with consequences if the requirements are not met by the deadlines given.** Under the current approved Recycled Water Policy, every region is required to complete a SNMP by February 3, 2016. Many regions have not complied with this requirement. The proposed amendment to the Recycled Water Policy would instead require that regions must consider a SNMP by 2020, and adopt the SNMP by 2026. However, the requirement to adopt the SNMP into the region's basin plan has been removed. We recommend that the requirement to adopt the	See response to Comment 2.093.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	SNMP in the basin plan remain in the Recycled Water Policy.		
23.006	It is also essential that the State Board not extend the requirement to adopt a SNMP beyond the proposed deadline (2026) during any subsequent amendments to the Recycled Water Policy. Salt and nutrients, left unmanaged within a waterway, can have detrimental effects on water quality and ecological health. The State Board must be able to enforce the 2026 deadline for adoption of a SNMP, and regulatory action must be taken if this deadline is not met.	The SNMP program within the Policy is primarily a collaborative program as opposed to an enforcement driven program. As stated in section 6.2.1.5 of the Amendment, the regional water board may use its authority pursuant to Water Code section 13242 to adopt plans and programs of implementation whether or not an SNMP has been accepted to address scenarios where water quality objectives are not being met.	6. Salt and nutrient management plans
23.007	**An adaptive management plan for the use of recycled water is necessary in order to properly monitor and regulate CECs.** We recommend that the State Board continue to support the incorporation of bioanalytical screening methods into the CEC Monitoring Program and invest in research to expand a bioscreening toolbox.	See response to Comment 2.009.	10. CECs and Attachment A
23.008	There is also a need to maintain an adaptive management plan for the monitoring of CECs in recycled water, based on most current available scientific studies. The State Water Board should reconvene the CEC expert panel every 3 years to reevaluate the CEC Monitoring Program, develop monitoring protocols to detect CECs impacting aquatic health, and investigate the risk and potential health exposure to cumulative CECs at low levels.	See responses to Comments 2.010, 2.011, and 2.012.	10. CECs and Attachment A

No.	Comment	Response	Categories
23.009	In California today, there is a need to capture, conserve, reuse and restore our water resources, even during non-drought years. Although Governor Brown declared an end to the five-year drought in 2017, there are many areas in California that have already returned to drought conditions, and even severe drought conditions. California must shift towards a lifestyle of water conservation, even during non-drought years. In order to reach our sustainability goals in California, we must eliminate direct discharge of recycled water, except where necessary to maintain beneficial uses. However, our use of recycled water must be done in a way that also protects public and environmental health. Thank you for the opportunity to comment.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
24	**Heal the Ocean** **Commenter: Hillary Hauser**		
24.001	Heal the Ocean followed the Southern California Coastal Water Research Project SCCWRP Panel of Experts' approach to monitoring strategies for CECs in Recycled Water since the process started in 2009 - from “Contaminants” to “Chemicals” to "Constituents." We pushed for the final report from the expert panel to be a truly a sufficient guideline for the monitoring of CECs that could be instituted by the State Water Resources Control Board in its Recycled Water Policy. In 2012 we asked the SCCWRP expert panel that a review schedule for CEC guidelines be no less than every three years. Now comes the **Proposed Recycled Water Policy Amendment**, which the State Water Board is considering for adoption, and the proposed CEC review schedule in this new draft is five years. But more alarming is the State Board's abandonment of the recycled water mandate itself.	See response to Comment 2.010.	10. CECs and Attachment A

No.	Comment	Response	Categories
24.002	First and foremost, we find it disconcerting that the State Board is abandoning its mandate by deleting the following: ***(1) The State Water Board hereby establishes a mandate to increase the use of recycled water in California by 200,000 afy by 2020 and by an additional 300,000 afy by 2030****. These mandates shall be achieved through the cooperation and collaboration of the State Water Board, the Regional Water Boards, the environmental community, water purveyors and the operators of publicly owned treatment works. The State Water Board will evaluate progress toward these mandates biennially and review and revise as necessary the implementation provisions of this Policy in 2012 and 2016...* *And replacing it with this:* *3. 4. Mandate for the Use of Recycled Water Goals and reporting requirements to track recycled water* *3.1. Goals. To* ***encourage*** *(emphasis ours) the increased use of recycled water in California, the State Water Board adopts the following goals:* *3.1.1. Increase the use of recycled water from the use of 714,000 acre-feet per year (afy) to 1.5 million afy by 2020 and 2.5 million afy by 2030.* *3.1.2. Minimize the direct discharge of treated municipal wastewater to enclosed bays, estuaries, and coastal lagoons, and ocean waters, except where necessary to maintain beneficial uses. For the purpose of this goal, treated municipal wastewater does not include brine discharges from recycled water facilities or desalination facilities.* While the afy numbers are hugely increased from original to revised draft (200,000 afy - to 1.5 million afy	See responses to Comments 2.042 and 2.046. To clarify, the numeric goals in section 3.1.1 of the Amendment is separate from the mandates in section 4.a.1 of the 2013 Policy and are consistent with the existing numeric goals in the Preamble of the 2013 Policy. The goals in the 2013 Policy are to increase recycled water use by at least 1 million afy from 2002 use levels by 2020, and at least two million afy by 2030. As 2002 recycled water use was approximately 500,000 afy, the 2013 Policy goals are 1.5 million afy by 2020 and 2.5 million afy by 2030. According to the most recent recycled water use survey, 714,000 afy of recycled water was used in 2015. Therefore, the numeric goal in section 3.1.1 of the Amendment to increase recycled water use from 714,000 afy to 1.5 million afy by 2020 and 2.5 million afy by 2030 is consistent with the 2013 Policy.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	by 2020; 300,000 afy to 2.5 million afy by 2030), these numbers are meaningless maybe even disingenuous) because all of these numbers are negated by the word "encourage," which converts this exercise into an aspiration, not a mandate. Staff claims this change will have no practical effect since the tools are currently not in place to enforce, but HTO believes giving up a mandate that came about because of severe drought that has not abated, is a very big deal. We reproduce the graphics of the original mandate here*:* *"If the mandates were maintained, the State Water Board would need to develop tools to make the mandates enforceable. But at this time, pursuing a path of enforcement is not appropriate. Currently, there is lack of a comprehensive tracking and reporting system* *for recycled water use that would be needed to understand whether or not mandates are being achieved accurately.* (Emphasis ours.) *"Furthermore, some regions of the state (i.e., the North Coast Region) have an abundance of clean, potable water. Not all regions of the state can reasonably meet mandates for the production and use of recycled water because of a lack of demand. Once tracking recycled water use improves and there is a better understanding of how much wastewater is available and feasible to recycle, mandates could be implemented and made enforceable through a future Policy amendment.* (Emphasis ours.)		

No.	Comment	Response	Categories
24.003	Heal the Ocean would like to take the opportunity to advise the Water Board that Heal the Ocean is about to publish an online interactive ***"Inventory of Municipal Wastewater Discharges to California Coastal Water Bodies: CY 2015"*** which has been compiled over the past four years by James Hawkins and Heal the Ocean staff, with close input from the Department of Water Resources. This report will be accessible to the State Board, and to all, by August 2018 - and illustrates the following: • **417 billion gallons (1.28 million acre-feet)** of treated municipal wastewater was discharged from treatment plants at 56 discharge locations into California coastal water bodies, including the Pacific Ocean and the San Francisco Bay, in the calendar year 2015; • This water could be available for landscape irrigation, groundwater recharge, or eventually direct use in drinking water supplies; • If an aggressive 85% of 2015 municipal wastewater effluent were recycled and used to offset or supplement drinking water supplies, 29% of urban water use in California's coastal regions could be met;	No change is requested. The commenter references their report titled "Inventory of Municipal Wastewater Discharges to California Coastal Water Bodies: CY 2015."	3. Goals, mandates, and reporting requirements
24.004	**The HTO Inventory Report** emphasizes that engineering feasibility and financial considerations will be significant factors in determining the viability of using existing coastal wastewater discharges for increasing recycled water production. However, HTO participates in the Santa Barbara County Integrated Regional Water Management (IRWM) program and matches wastewater plants with state low-interest revolving loans and grants that are available to help wastewater plants upgrade to recycled water plants.	No change is requested. The commenter further details their report titled "Inventory of Municipal Wastewater Discharges to California Coastal Water Bodies: CY 2015."	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
24.005	The Policy keeps a five-year timeframe in-place for the CEC Science Advisory Panel while the Panel itself recommended reconvening every three years: o "The Science Advisory Panel recommended reconvening the Panel every three years; however, the Amendment includes a provision to reconvene the Panel every five years" (p. 76).	See response to Comment 2.010.	10. CECs and Attachment A
24.006	The Draft Policy removes monitoring requirements in landscape irrigation projects for the state's priority pollutants. Currently, recycled water projects greater than 1 MGD have to monitor for these pollutants on an annual basis. Projects that are less than 1 MGD have to monitor for these pollutants every five years. In analyzing available monitoring data at existing recycled water projects under the existing monitoring regime, the State Water Board finds the following: *"The priority pollutants with the highest exceedance frequencies are **NDMA** (emphasis ours) at 6% (8 exceedances of 145 monitoring events), aldrin at 4% (5 exceedances of 121 monitoring events), dieldrin at 4% (8 exceedances of 215 monitoring events) and DDT at 3% (6 exceedances of 174 monitoring events), and 3,3'-dichlorobenzidine at 3% (2 exceedances of 67 monitoring events). These exceedance frequencies are still relatively low, and the exceedance frequencies are based on relatively small numbers of monitoring events. The **NDMA exceedances occurred at a single facility*** (emphasis ours), *the aldrin exceedances occurred at two facilities, the dieldrin exceedances occurred at two facilities, the DDT exceedances occurred at two facilities, and the 3,3'-dichlorobenzidine exceedances occurred at **one facility**,* (emphasis ours) *indicating that these are not widespread issues* (emphasis ours). *More frequent*	See response to Comment 23.004 and section 4.9.1 of the Staff Report with SED for the rationale for removing priority pollutant monitoring requirements for landscape irrigation recycled water projects from the Policy. While the low incidence of exceedances of priority pollutants contributed to the recommendation to remove priority pollutant monitoring from the Policy, several other factors additionally contributed to the recommendation as discussed in response to Comment 23.004 and section 4.9. of the Staff Report with SED. To clarify the number of monitoring events, NDMA was monitored at 10 facilities in the last five years, and 3,3'-dichlorobenzidine was monitored at 8 facilities. Regional water boards require priority pollutant monitoring only for constituents with a reasonable potential for exceedance. It is likely that more facilities did not monitor for these constituents because the regional water boards found there was no reasonable potential for an exceedance based on past monitoring data. Exceedance of NDMA at a single facility indicates that of the 10 facilities at which NDMA was monitored, only one facility exceeded the threshold of concern. Likewise, 3,3'- dichlorobenzidine was monitored at 8 facilities and only one facility exceeded the threshold of concern. The low exceedance rate therefore contributes to rather than detracts from the recommendation to remove	7. Permitting for Non-potable

No.	Comment	Response	Categories
	monitoring of a particular priority pollutant indicates that there had been a detection or exceedance of that pollutant in the past for a given facility that demonstrated there was reasonable potential for an exceedance to occur. If there is no reasonable potential for an exceedance based on past monitoring data, then less frequent monitoring is required at a given facility" (p. 61). Heal the Ocean takes issues with these conclusions. As we learned in the SCWRRP Expert Panel Hearings, NDMA is an indicator of other pollutants. Monitoring from one single facility, or even two facilities, is not adequate to assure the public that the contamination issue is well covered - even if the recycled water is used for watering park lawns. The monitoring data must be ramped up considerably before the public will accept recycled water for potable use (!). In Santa Barbara County, we have a community (Montecito, CA) that refuses recycled ("purple pipe") water even on parklands, golf courses, et al. because of fear of contamination. This skimpy monitoring is not going to reassure the community, even though it desperately needs water for its increasingly parched landscaping (not to mention expensive golf courses).	priority pollutant monitoring requirements for landscape irrigation recycled water projects.	

No.	Comment	Response	Categories
24.007	On the other hand, we have a water district (Goleta Water District) that has developed (with SWRCB funding help) an engineering plan for a pilot direct potable reuse project to "test the water ourselves," because the State Board, in their opinion, is moving too slowly to get recycled water off the ground for any such beneficial use. The City of Santa Barbara is moving toward a **"One Water"** ideology, in which Cachuma water, State Water, Desal Water and Recycled Water would mix in a reservoir, where all is processed by the water processing plant. To move toward such a "One Water" ideal solution to the severe water shortage, the City of Santa Barbara and County of Santa Barbara and other California counties are facing, the Recycled Water program of the State must move faster - <u>much faster</u> - to catch up. Monitoring must be increased many-fold.	See response to Comments 23.004 and 24.006. Pursuant to the requirements of CCR, title 22, any potable recycled water project must monitor for priority pollutants, all constituents with a drinking water Notification Level, and any other constituents identified by the State Water Board. These requirements exist in addition to the CEC monitoring requirements in Attachment A of the Amendment. In addition, reservoir water augmentation projects must implement a pretreatment and pollution source control program to identify and mitigate chemicals and contaminants of concern in the wastewater treatment system.	7. Permitting for Non-potable
24.008	In 2012 we asked the SCCWRP expert panel that a review schedule for CEC guidelines be no less than every three years, and we ask it now.	See response to Comment 2.010.	10. CECs and Attachment A
24.009	We respectfully take issue to this statement in the Draft Amendment: *"Furthermore, some regions of the state (i.e., the North Coast Region) have an abundance of clean, potable water. Not all regions of the state can reasonably meet mandates for the production and use of recycled water because of a lack of demand."* The Draft Policy Amendment should reflect the fact that One Size does Not Fit All. To propose a policy that imposes requirements where none is needed requires reworking. To have a Policy that states "we have a lot	Changes were made to section 4.5.1.1. of the Staff Report with SED to clarify that a "one size fits all" approach may not be appropriate for recycled water mandates. The referenced passage now reads: "Currently, there is lack of a comprehensive tracking and reporting system for recycled water use that would be needed to accurately understand whether or not mandates are being achieved. ~~Furthermore, some regions of the state (i.e., the North Coast Region) have an abundance of clean, potable water.~~ Not all regions of the state can reasonably meet mandates for the production and use of recycled water because of a lack of demand and an abundance of clean, potable water. Once tracking recycled water use improves	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	of water over here, therefore..." should not even be in print.	and there is a better understanding of how much wastewater is available and feasible to recycle, mandates could be implemented and made enforceable through a future Policy Amendment."	
24.010	Staff has indicated plans to move forward with a recycled water tracking system, which would include monitoring plans for wastewater discharges to coastal water bodies. As indicated earlier in our comments, Heal the Ocean has already done this data collection and is about to release it. We offer it to the Water Board - either directly in a State database, or we will provide a link to you, to have this information. There is no sense in duplicating hours and hours of research work.	There is some overlap between the data collected in the commenter's study and the Amendment's reporting requirements regarding the volume of treated wastewater directly discharged to saline waters. However, the Amendment's reporting requirements are not duplicative of the work finished by the commenter since these data would capture statewide wastewater available for recycling, not only wastewater in coastal areas. In addition, the Amendment would create ongoing annual reporting requirements so that the State Water Board can gather these data annually and track progress towards the statewide goals outlined in section 3.1 of the Amendment.	3. Goals, mandates, and reporting requirements
24.011	We hope you will accept these comments as our wish to have a Recycled Water Policy that is truly meaningful, and which can move the state forward where it needs to go. There is water available; we are all working on it. We are working with you, and we invite you to ask us. Thank you!	This is the concluding statement to the comment letter, preceded by Comments 24.001 to 24.010. No change was requested.	12. General Comment
25	**Irvine Ranch Water District** **Commenter: Paul Cook**		

No.	Comment	Response	Categories
25.001	As a national leader in recycled water, the Irvine Ranch Water District (IRWD) has supported efforts to increase water recycling in California, and has advocated for the benefits of a "fit-for-purpose" regulatory approach to recycled water within the state. IRWD believes that recycled water is a key component of the state's water supply portfolio and expansion of reuse will enhance the state's overall water reliability. IRWD appreciates the opportunity to comment on the proposed amendments to the "Policy for Water Quality Control for Recycled Water" (Proposed Amendments). IRWD supports the comments submitted by WateReuse California and the California Association of Sanitation Agencies. It is our hope that the State Water Resources Control Board (State Board) will acknowledge and address the concerns voiced by these groups, which represent the majority of California's active recycled water producers.	The commenter is stating support for comments submitted by WateReuse California and the California Association of Sanitation Agencies. See the responses to Comment Letter 41.	12. General Comment

No.	Comment	Response	Categories
25.002	**Proposed Addition of an Additional Recycled Water Goal:** In an effort to avoid duplication, IRWD has not submitted comments similar to those made by the associations, although we agree with them that the new goal related to minimizing ocean discharges should be removed. *We would ask that, if it is the State Board's desire to keep such a statement, that the State Board work with the associations and coastal recycled water producers to develop alternative placement for such a statement and alternative language.* At a minimum, any alternative language should recognize that efforts to reduce the amount of treated wastewater discharged to the ocean should be balanced with the costs, challenges, and feasibility constraints many coastal communities face in order to increase the use of recycled water within their service areas, and reflect Water Code's focus on the cost-effective expansion of recycled water use.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
25.003	Furthermore, prior to providing detailed comments on two additional items in the Proposed Amendments, IRWD would like to thank you and your staff for the time and effort the State Board has invested in the Proposed Amendments. We recognize that the Proposed Amendments are intended to provide greater statewide consistency in the permitting of recycled water projects. Toward that end, we greatly appreciated Chief Deputy Director Jonathan Bishop's statement at the June 19, 2018, public hearing that the Proposed Amendments are not intended to require recycled water agencies holding individual permits for their recycled water projects to transfer to or enroll under the statewide general order (Order WQ 2016-0068-DDW). Instead, he clarified that the Proposed	This comment is linked and is a leading statement to Comment 25.004	11. Permit review and update

No.	Comment	Response	Categories
	Amendments are intended to ensure that those individual permits meet the policies outlined in the Recycled Water Policy.		
25.004	IRWD, like many recycled water providers throughout the state, has worked with its regional boards to expand recycled water use throughout its service area. The current permits governing IRWD's recycled water production, distribution, and customers appropriately balance public health, water quality protection, and administrative burden to encourage recycled water use. *While we recognize that not all recycled water providers have had this type of working relationship with their regional board. IRWD believes that such relationships should continue to be encouraged by the State Board and individual permits should continue to be allowed.*	See responses to Comments 7.009 and 8.046.	11. Permit review and update
25.005	IRWD has many years of experience gathering, reporting, and analyzing data within the water sector. Over the years, it has become more apparent that the time-intensive reporting burden on water districts and water agencies-which send monthly, annual and semi-annual reports to multiple government agencies with the same data categories-is heavy. Often these mandatory reports require the same data but in different formats and time-periods, which only increases the administrative burden on water agencies while providing no additional information to the receiving governmental agencies. IRWD has been an advocate for smarter reporting of data that better balances the burden with the need.	See response to Comment 1.037.	3. Goals, mandates, and reporting requirements
25.006	With regards to the Proposed Amendments, IRWD is comfortable with the data being sought under Section 3.2, et seq. and with the annual reporting of recycled water use.	The commenter supports section 3.2 of the Amendment relating to the required annual reporting of reporting wastewater and recycled water use.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
25.007	To better balance the State Board's need for the requested data with the burden on local agencies, *IRWD requests that the Proposed Amendments be modified to streamline the required reporting and make clear that other duplicative reporting of wastewater influent, production and discharge of municipal wastewater treatment, and recycled water use is to be discontinued.*	See response to Comment 1.037.	3. Goals, mandates, and reporting requirements
25.008	IRWD also requests that the monthly reporting for municipal wastewater treatment plant influent, production and disposal be modified. *Specifically, we urge the State Board to modify the monthly reporting provisions to require only the annual reporting of the monthly data instead of setting a monthly reporting schedule.*	The requested change to require annual reporting of the monthly data was made to the amendment.	3. Goals, mandates, and reporting requirements
25.009	In order to accomplish this and to streamline the reporting, IRWD recommends that: • Section 3.2 be amended to reflect the intent that the data being reported pursuant to the Section 3.2, et seq. should ultimately be reported in the California Integrated Water Quality System (CIWQS);	See response to Comment 1.037.	3. Goals, mandates, and reporting requirements
25.010	• Sections 3.2.1.1, 3.2.1.2 and 3.2.1.3 be modified to replace "on a monthly basis" with "on an annual basis" and to add "The monthly" as the beginning of each section;	See response to Comment 25.008. The intent of the requested change was made although the specific language suggested by the commenter was not accepted.	3. Goals, mandates, and reporting requirements
25.011	• Section 4.2 be amended to direct the Regional Boards to discontinue all reporting of the wastewater influent, production and discharge of municipal wastewater treatment, and recycled water use data being reported to the State Board, per the Proposed Amendments, and to use the data reported to the State Board instead; and	See responses to Comments 1.037, 1.045, and 11.003.	4. State agency roles

No.	Comment	Response	Categories
25.012	Section 4.3 be modified to include a stronger statement encouraging the Department of Water Resources to use the State Board reported data, as a means of streamlining data reporting and collection.	See response to Comment 11.003.	4. State agency roles
25.013	Furthermore, we asked that Section 3.2.1, expressly recognize that the volume of influent entering a wastewater treatment plan will not equal the volume of treated wastewater produced. If the goal is to calculate where all of the influent is used or disposed of, or if the goal is to be able to calculate the amount of influent left to be reclaimed in California, the Board may want to consider asking agencies to report the amount of influent which is not reclaimable-this amount would largely consist of the volume of solids in the wastewater influent, water used in the treatment process, and brine.	See response to Comment 1.041.	3. Goals, mandates, and reporting requirements
25.014	The Proposed Amendments appropriately define "incidental runoff," but remove provisions that recognize incidental runoff occurs even when landscapes are being irrigated efficiently and responsibly. Section 7.4, titled "Incidental runoff of recycled water for irrigation" seems to implicitly acknowledge this, but the text of the section does not expressly address incidental runoff. *IRWD asks that Section 7.4 be modified along the lines of the following to expressly recognize and permit incidental runoff: "Recycled water, more than incidental runoff, shall not be allowed to escape from the use area as surface flow that would either pond or enter surface waters, unless authorized by water discharge requirements, waivers of waste discharge requirements, or conditional prohibitions (e.g., agricultural dischargers from irrigated lands). "*	The Amendment was revised to reflect the intent of the change the commenter requested, although the specific language suggested by the commenter was not accepted.	7. Permitting for Non-potable

No.	Comment	Response	Categories
25.015	Conclusion Thank you again for considering IRWD's comments on the Proposed Amendments. We appreciate the State Board's interest in making water recycling projects easier and more attractive for agencies to pursue, and we look forward to continuing the conversation on the Proposed Amendments with you and your staff.	This statement is a closing statement to the comment letter; no change is requested.	12. General Comment
26	**Los Angeles Department of Water & Power** **Commenter: Katherine Rubin**		
26.001	LADWP commends the SWRCB on its continued work on this policy in order to allow for the use of recycled water. Since the last amendment in 2013, there have been changes that will support an expanded use of the recycled water program which is important for areas throughout California that will need to find an alternative to potable water. With respect to this version of the amendment, LADWP appreciates and supports that the SWRCB may consider potential cumulative impacts of past, present, and probable future projects. LADWP also appreciates the clarification for wastewater change petitions as well as the language for salt and nutrient management plans. In addition, LADWP was pleased to see that the mandates have been changed to goals for encouraging the increased use of recycled water. These modifications are valuable for the success and use of recycled water going forward. As we continue to work together, LADWP respectfully provides the following comments on the Proposed Amendment:	This comment is opening supportive remarks leading to comments 26.001 to 26.023; no change is requested.	12. General Comment
26.002	LADWP believes the Proposed Amendment should be flexible and allow for a streamlined process to approve recycled water projects. The focus should be on the benefits and maximizing the use of recycled water.	Comment noted.	12. General Comment

No.	Comment	Response	Categories
26.003	LADWP encourages greater interagency coordination so that these projects and 1211 petitions have a well organized and efficient path forward that is cost-effective and time-saving.	Comment noted. The State Water Board agrees. Also see response to Comment 7.006.	5. 1211 and WW Change Petitions
26.004	LADWP believes that for those areas where the science shows the loading of the nutrients does not warrant the need for a Salt and Nutrient Management Plan (SNMP), the requirements should be flexible and streamlined.	Section 6.1.3 of the Amendment requires the regional water boards to identify basins requiring salt and nutrient management plans to achieve water quality objectives, as well as those where SNMPs may not be necessary. If nutrients do not pose a threat to water quality in a basin, the regional water board may determine that an SNMP is not needed for the basin. Sections 7 and 8 of the Amendment provide flexibility and guidance on permitting recycled water projects both in basins with and without SNMPs.	6. Salt and nutrient management plans
26.005	Duplication of analysis and reporting needs to be evaluated and existing databases such as the California Integrated Water Quality System (CIWQS) and other sources that are already in place for monitoring and reporting are utilized instead of reinventing new ones.	See response to Comment 1.037.	3. Goals, mandates, and reporting requirements
26.006	Regulatory certainty is important for successful implementation of recycled water projects and therefore should be a goal of this Proposed Amendment.	The purpose of the Recycled Water Policy is to encourage the safe use of recycled water in a manner that implements state and federal water quality laws and protects human health and the environment. The Amendment provides regulatory certainty by providing permitting guidance for potable and non-potable recycled water projects.	3. Goals, mandates, and reporting requirements
26.007	**Definition for Water Purveyor (p. v)** With regards to the definition of Water Purveyor, LADWP believes more clarity is needed. LADWP recommends clarifying the inclusion of recycled water in the definition for a Water Purveyor as: "An entity that supplies water and/or recycled water."	The proposed change was not accepted. Water Code section 13050(n) defines recycled water as “water which, as a result of treatment of waste, is suitable for a direct beneficial use or a controlled use that would not otherwise occur and is therefore considered a valuable resource.” Under this Water Code definition, recycled water is a type of water. It is therefore not appropriate to distinguish “water” from “recycled water” as the commenter proposes; recycled water is included in the use of the term “water.”	14. Definitions

No.	Comment	Response	Categories
26.008	**Goals and Reporting Requirements (Section 3.2, p.3)** The Proposed Amendment establishes reporting requirements set by the SWRCB. In order to provide regulatory certainty and avoid confusion, in addition to the requirements to be consistently applied throughout the State, LADWP believes clarification is needed as to whether or not these reporting requirements will replace or supersede those set by the Regional Water Quality Control Boards (Regional Boards). LADWP recommends adding language to clarify whether the SWRCB reporting requirements will replace or supersede reporting requirements set by the Regional Boards.	See response to Comment 1.037.	3. Goals, mandates, and reporting requirements
26.009	**Goals and Reporting Requirements (Section 3.2, p.3)** The Proposed Amendment also updates the language from "mandates" to "goals" throughout the document. As such, LADWP believes that there was an oversight with the sentence, and suggests changing the phrase "or establish mandates" from Section 3.2 to "or establish goals."	The referenced language in section 3.2 of the Amendment was purposeful and not an oversight. However, “or establish mandates” has since been removed from the Amendment.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
26.010	**Goals and Reporting Requirements Definitions (Section 3.2.1.4.2, p.5)** In Section 3.2.1.4.2 of the Proposed Amendment (p. 5), it appears that the definitions of Reservoir Water Augmentation and Raw Water Augmentation are the same. LADWP believes this may have been an error. Reservoir Water Augmentation is the planned placement of recycled water into a raw surface water reservoir used as a source of domestic drinking water supply for a public water system, as defined in Section 116275 of the Health and Safety Code, or into a constructed system conveying water to such a reservoir (Water Code §13561) as described in the Proposed Amendment. Raw water augmentation is the planned placement of recycled water into a raw water supply, such as a reservoir, lake, groundwater basin. Therefore, LADWP requests the SWRCB clarify these two definitions.	See response to Comment 6.004. The definitions are the same as definitions provided in Water Code section 13561.	3. Goals, mandates, and reporting requirements
26.011	**Wastewater Change Petitions (Section 5, p.9)** LADWP agrees with the intent in Section 5.2, however it is not clear which guideline(s) the SWRCB would use to determine whether the proposed change would cause injury or unreasonably affect instream uses. LADWP recommends more discussion with stakeholders in order to provide regulatory certainty to determine which guidelines should apply.	There are no set guidelines, but rather a case by case analysis is currently completed for evaluating impacts, including consultation with California Department of Fish and Wildlife and other resource agencies. There is also a public notice and review process that helps to identify potential injury to other water right holders or the environment. This process is consistent with the procedures established under Water Code section 1701.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
26.012	In Section 6.1.2, the Proposed Amendment refers to "salt and nutrient pollution." LADWP suggests changing this to "salt and nutrient loading" due to the possible misconstruction of the word pollution. To a certain degree, the salt and nutrients are necessary and may need to be managed in some areas where recycled water is utilized, but should not be misinterpreted as inherently harmful pollutants.	Section 6.1.2 of the Amendment was changed to refer to salt and nutrient "issues" rather than "pollution" in response to the comment.	6. Salt and nutrient management plans
26.013	In Section 6.2.1.3, LADWP suggests adding "a salt and nutrient management plan that is in the development phase in coordination with the Regional Water Board" as one of the exemptions to the requirements of Section 6.2.4.	Section 6.2.1.3. of the Amendment was modified and now reads, "Salt and nutrient management plans adopted as a Basin Plan amendment or accepted by the regional water board prior to [effective date of the Policy] shall be evaluated pursuant to 6.2.6 and 6.2.7 by [five years from effective date of the Policy]." Sections 6.2.6 and 6.2.7 of the Amendment require the regional water boards to evaluate monitoring data generated from salt and nutrient management plans every five years, and if warranted, determine whether updates to salt and nutrient management plans are needed. It is reasonable to evaluate salt and nutrient management plans for consistency with the Policy and determine if changes in basin conditions or assessments warrant an update to the salt and nutrient management plan. In addition, it is reasonable for salt and nutrient management plans in development to incorporate the changes to the salt and nutrient management plan requirements of the Amendment. As such, SNMPs that are in development should not be exempt from the requirements of section 6.2.4 of the Amendment.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
26.014	The Science Advisory Panel's (SAP's) recommendations for the Monitoring Strategies for Constituents of Emerging Concern (CECs) in Recycled Water dated April 2018, found there to be little to no threat for most chemicals in recycled water and concluded that work remained before a useful collection of assays would be ready for use to determine regulatory compliance. The SAP concluded that CEC monitoring is applicable for potable recycling uses, but unnecessary for non-potable reuse applications approved under Title 22 (Monitoring Strategies for CECs in Recycled Water, Section 9.2, p. 98).	See response to Comment 8.044.	10. CECs and Attachment A
26.015	Similarly, although Estrogen receptor (ER) and Aryl Hydrocarbon receptor (AhR) bioassays show more utility than some conventional analytical techniques for assessing risk, simply detecting "activity" with the assay does not necessarily indicate that the recycled water will pose a threat to the environment or human health.	See response to Comment 8.044 regarding the safety of recycled water. The goal of including *in vitro* bioassays as monitoring requirements for groundwater recharge and reservoir water augmentation recycled water projects in the Amendment is to help screen for unknown compounds that may occur in recycled water and assess their potential to affect human health or the environment. ER- α and AhR were recommended by the Panel for various reasons including because they have established linkages to adverse outcomes. Simply detecting activity does not necessarily indicate the recycled water will pose a threat to human health or the environment. However, the amount of bioactivity (BEQ) and the duration of the CECs factor in to the potential risk. Attachment A includes assessment response actions in section 5, for recycled water producers to apply the assessment framework and determine appropriate response actions. Section 4.14.3 of the Staff Report with SED includes a discussion of bioanalytical screening tool assessment and response actions.	10. CECs and Attachment A
26.016	LADWP also believes many laboratories will be unable to absorb the estrogen and aryl hydrocarbon receptor assay screening requirements.	See response to Comment 6.006.	10. CECs and Attachment A

No.	Comment	Response	Categories
26.017	There is further concern about the consistency of results and the ability to develop testing in timely manner.	See response to Comment 6.006.	10. CECs and Attachment A
26.018	Furthermore, the proposed Monitoring Trigger Level (MTL) for the AhR assay (0.5 ng/L) is too close to the Method Detection Limit and the Reporting Limit. The results at that level are therefore estimated, and response actions should not be tied to unstable results.	The State Water Board acknowledges that the monitoring trigger level for AhR is the same as the reporting limit for the bioassay, which is not ideal if the biological equivalent concentration is at the reporting limit. But after the initial assessment monitoring phase, it is appropriate to continue to monitor or investigate any bioactivity detected by AhR for the reasons outlined in section 4.14.3 of the Staff Report with SED.	10. CECs and Attachment A
26.019	To that end, the SAP also stated that response actions would be premature at this time, and recommended a phased implementation of bioanalytical screening. Although the Amended Recycled Water Policy also proposes a three-phased implementation approach, it did not follow the SAP's recommendations. The initial assessment monitoring phase, which appears to correspond to Phase I of the SAP's approach, would only be conducted for a period of one year, and several response actions are required if monitoring results exceed designated thresholds. This would be followed by a second phase of baseline monitoring for a period of three years, once again with several required response actions if monitoring results exceed certain thresholds. The third phase would be the standard operation monitoring phase, which would be based on the findings of the baseline monitoring phase. LADWP respectfully requests modification of the Amended Policy to reflect the SAP's recommendations. LADWP recommends that Phase I be extended to a three to five year period, since a one-	See responses to Comments 8.003, 8.013, 8.018, and 8.020.	10. CECs and Attachment A

No.	Comment	Response	Categories
	year monitoring program is unlikely to provide sufficient data to determine whether it will be appropriate to continue with the recommended in vitro bioassays or adjust the monitoring recommendations based on new developments in technology and application. LADWP also recommends deleting the requirement for response actions during Phase 1, since the Panel indicated that the existing process for interpreting and responding to in vitro bioassay results does not justify response actions at this time. LADWP recommends changing Phase II to a one-year pilot study to test the new monitoring framework developed after assessment of the Phase I results, as envisioned by the SAP, with deletion of the requirement for a three-year baseline monitoring program and for response actions during Phase II. Phase Ill would continue to represent the standard operation monitoring program, but should not be implemented until the bioanalytical methods have been standardized, validated, and certified (per the SAP's recommendation).		
26.020	In summary, LADWP believes that more research is essential to provide cost-effective, standardized approaches and transparent interpretation guidelines. LADWP suggests revisiting the SAP's recommendations and delaying the implementation of bioanalytical screening.	See responses to Comments 6.006, 8.003, 8.016, 8.018, 8.020, and 8.022.	10. CECs and Attachment A
26.021	LADWP recommends requiring that the SAP review the bioscreening data collected during Phase I, in consultation with SWRCB staff, utility personnel and other interested stakeholders. This could be accomplished through the formation of a "Bioanalytical Advisory Group," as recommended by the SAP, to interact with on-going and future efforts to develop, evaluate and apply bioanalytical tools for water quality screening.	See response to Comment 8.016.	10. CECs and Attachment A

No.	Comment	Response	Categories
26.022	**Monitoring Locations for Groundwater Recharge - Surface Application (Attachment A, p. A-10)** In order to be consistent with the new language in the SWRCB's regulations for Groundwater Replenishment Using Recycled Water (DPH-14-003E), LADWP suggests replacing the sentence at the top of page A-1O: At monitoring well locations designated in consultation with the State Water Board within the distance groundwater travels downgradient from the application site in 30 days. with the following sentence: At monitoring wells locations consistent with the requirements set by California Code of Regulations (CCR) section 60320.126, and approved by the Division of Drinking Water. Water does not travel quickly through soil and in many instances will take more than 30 days to reach a nearby monitoring well. As such, sampling in 30 days is unlikely to yield meaningful results. Therefore, LADWP recommends, as has been noted above, that the SWRCB use the requirements set in the CCR Section 60320.126.	The proposed revision was not accepted as it could result in monitoring wells that meet the requirements of CCR section 60320.126 but do not satisfy the intent of the Science Advisory Panel's recommendations. Monitoring beyond 30 days of travel through the saturated zone will not likely reflect the effectiveness of soil aquifer treatment. The project proponent is required to account for dilution from non-recycled water sources, but the wide evaluation range (any time above one month) set forth in CCR section 60320.126 will be an additional burden to regional board staff. Additionally, groundwater quality data collected pursuant to section 60320.126 is meant to monitor the impact of the recharge project on the existing groundwater. Unlike the Policy's requirement, water quality monitoring required in CCR section 60320.126 does not involve adjusting for "differences in concentrations due to dilution from potable water applied to the application site, stormwater applied to the application site, and native groundwater" or adjustments "to account for CECs in these waters." Maintaining the Policy text will reduce confusion for regional water board staff when reviewing monitoring well data and for dischargers when reporting.	10. CECs and Attachment A

No.	Comment	Response	Categories
26.023	In concurrence with the comment above, LADWP suggests replacing the following sentences: The distance between the application site and the monitoring wells shall be no more than the distance the groundwater travels in 30 days downgradient from the application site. The location of the monitoring wells shall be designated by the regional water board in consultation with the State Water Board. with the following sentence: The location of the monitoring wells shall be consistent with the requirements set by CCR section 60320.126, and be approved by the Division of Drinking Water.	See response to Comment 26.022.	10. CECs and Attachment A
27	**Main San Gabriel Basin Watermaster** **Commenter: Anthony C. Zampiello**		
27.001	The Main San Gabriel Basin Watermaster (Watermaster) is the Court-appointed agency which manages the surface water and groundwater supplies of the Main San Gabriel Basin (Main Basin) and its Relevant Watershed. In that capacity, Watermaster was the lead agency to coordinate, prepare and submit the "Salt and Nutrient Management Plan" (SNMP) for the Main Basin which was required by the "Recycled Water Policy" adopted in 2009. The SNMP for the Main Basin was approved by the State Water Resources Control Board (SWRCB) on May 16, 2017. Watermaster has had an opportunity to review the draft document entitled "Amendment to the Policy for Water Quality Control for Recycled Water" and provides the following comments.	This is the introductory statement to the comment letter, followed by Comments 27.002 to 27.006.	12. General Comment

No.	Comment	Response	Categories
27.002	Although maintaining some of the original elements from the 2009 Recycled Water Policy, the draft 2018 Recycled Water Policy appears to be re-written in its entirely. This creates a challenge to clearly discern whether prior submittals (including the SNMP) will be affected under the amended Recycled Water Policy, if adopted. It would be beneficial to have a definitive statement in the draft Recycled Water Policy that an approved SNMP, or other SWRCB documents, is not subject to revision for at least 10 years following the date of adoption. This would be consistent with Section 6.1.3 requiring each regional board to evaluate the need for salt and nutrient planning.	See response to Comment 26.013.	6. Salt and nutrient management plans
27.003	In addition, Watermaster's downloaded copy of the draft 2018 Recycled Water Policy included numerous areas where " ... pursuant to 0... " is referenced, e.g. Sections 6.2.6, 7.1.2, and 8.2.2, among others. Although this appears to be a place-holder, it would be beneficial to enter the appropriate sections intended to be referenced and provide a time extension for public review so that the draft document may be reviewed in context.	This error has been corrected.	12. General Comment
27.004	Section 5.2 states in part " ... determine that the proposed change will not injure any other legal user of the water involved, will not unreasonably affect instream users involving fish and wildlife, and is in the public interest." This section appears to be in conflict with itself. There likely are, or may be, circumstances when the legal user of the water already is authorized to make a discharge to a certain reach of a river/stream and is simply making a request to change the point of release. Failure to authorize a change petition may result in injury to the legal user in favor of continuing releases for fish and wildlife. Furthermore, continued releases for fish and wildlife may adversely impact the stated goal in Section 3.1.1 to increase the use of recycled water to 2.5 million acre-feet per year	There is no conflict within section 5.2 because the required analysis is whether the proposed change will injure any "other" legal user of the water – as opposed to the legal user that has filed a change petition. See Water Code sec. 1701.1(d). The commenter suggested that only a limited amount of recycled water be set aside for instream beneficial uses, particularly in effluent dominated streams. Determination of the minimum flows needed to remain instream to protect the environment and other beneficial uses is a critical function of the State Water Board wastewater change petition process and in most cases is based on a consideration of site-specific factors that cannot be specified in this Amendment. However, in some streams instream flow requirements have already been established. In other streams, the State Water Board may pursue	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
	by 2030. Consequently, it is suggested additional language be included to limit the quantity of recycled water to be set aside for fish and wildlife in favor of recycled water reuse, particularly where recycled water is essentially the only water in the stream/river channel, and effectively artificially creates habitat.	development of a Policy for Water Quality Control or other action that would establish minimum instream flow requirements.	
27.005	Section 6.2.11 states in part " ... the salt and nutrient management plans may address constituents other than salts and nutrients... " Watermaster suggests this language be clarified to say "may, <u>but is not required to</u>, address... "	The requested change was not made. "May" implies that it is not required to address constituents other than salts and nutrients, and no clarification is needed.	6. Salt and nutrient management plans
27.006	Section 6.2.6 Watermaster requests the bullet "potential new data gaps" be removed.	The requested change was not made. The purpose of including "potential new data gaps" is to acknowledge that new information and/or new conditions that might be uncovered during a periodic review may also uncover new data gaps in the understanding of the basin.	6. Salt and nutrient management plans
28	**The Metropolitan Water District of Southern California** **Commenter: Mickey Chaudhuri**		
28.001	Metropolitan commends the State Water Board for its effort to update the Recycled Water Policy, which is intended to provide clear guidelines for the safe use of recycled water and consistency in permitting recycled water projects in California.	This is an introductory statement leading to comments 28.003 – 28.012; no change is requested.	12. General Comment
28.002	Metropolitan supports water recycling as a way to improve regional self-sufficiency and to meet future needs. The proposed Recycled Water Policy encourages expanding recycled water use in California while remaining protective of public health and the environment. In order to strengthen the proposed policy, Metropolitan offers the following comments:	This is an introductory statement leading to comments 28.003 – 28.012; no change is requested.	12. General Comment

No.	Comment	Response	Categories
28.003	**1. Remove the proposed goal of the Recycled Water Policy to minimize direct discharge of treated municipal wastewater** The proposed Recycled Water Policy sets a goal to minimize the direct discharge of treated municipal wastewater to enclosed bays, estuaries, coastal lagoons, and ocean waters, except where necessary to maintain beneficial uses (section 3.1.2). Metropolitan agrees that brine discharges should be excluded from the proposed goal of diverting wastewater discharges. However, while Metropolitan supports expanding recycled water production, we believe that minimizing the direct discharge of treated water to receiving water is an outcome rather than a goal of water recycling. In addition, the goal as stated is too restrictive and does not allow for consideration of local conditions and circumstances in determining to what extent treated wastewater can be beneficially and cost-effectively reused. For example, in order to minimize discharge to the ocean, multiple agencies would have to collaborate to treat, store and distribute the recycled water. Technological, environmental, institutional, and economic constraints may minimize or even eliminate the opportunity for certain utilities to reduce their wastewater discharges. Metropolitan recommends that the State Water Board remove the goal of minimizing direct discharge of treated municipal wastewater. Rather, this provision should be added as one of the intents of the policy, included in the purpose statement (section 1) of the proposed Recycled Water Policy.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
28.004	**2. Do not include the modification of facility operations as a response action based on CEC monitoring and bioanalytical screening results** Tables 8 and 10 of Attachment A of the proposed Recycled Water Policy provide recommended thresholds and response actions associated with constituents of emerging concern (CECs) and bioanalytical assay monitoring results. The proposed policy recommends additional actions such as resampling, increased monitoring, source identification, toxicological and engineering studies, and/or modification of facility operations if monitoring results exceed the recommended thresholds. While investigative actions such as additional monitoring and further study may be warranted when thresholds are exceeded, modification of facility operations based on CEC monitoring and bioanalytical screening results is premature. CECs are unregulated contaminants and do not impose compliance requirements on water and wastewater agencies. In addition, in the 2018 "Monitoring Strategies for CECs in Recycled Water" (CEC Monitoring Strategies Report), the CEC Science Advisory Panel concluded that response actions during the initial data collection phase are not appropriate. Metropolitan recommends that the State Water Board remove the response action indicating modification of facility operation based on CEC and bioanalytical assay monitoring results.	Table 8. MEC/MTL Thresholds and Response Actions for Health-based CECs remains unchanged from the 2013 Policy. Response actions include modification of facility operation, engineering removal studies, and implementation of source identification. The response actions from the Policy were used as the basis for the assessment framework and response actions in Table 10 for the bioanalytical screening tools. If the recycled water producer is measuring bioanalytical equivalent concentrations of 1000 times higher than the monitoring trigger level, this would mean biological equivalent concentrations of estrogenic CECs would be 3500 ng/l or 1000 times higher than a health-based monitoring trigger level for ER- α. Although the Ah-R monitoring trigger level is not a health-based trigger level, a BEQ/MTL ratio of 1000 could mean the concentration of AhR-activating CECs could be 500 ng/l. In either case it would be important for a recycled water producer to follow up with additional actions including potentially modifying the treatment system to ensure adequate protection of public health. The Water Boards could recommend modifying the treatment system after the source of the bioactivity has been identified. Modifying the treatment system could mean replacing faulty equipment that is not functioning as permitted.	10. CECs and Attachment A
28.005	**3. Incorporate the three-phased monitoring approach for bioscreening of recycled water, as recommended by the CEC Science Advisory Panel** Metropolitan agrees with the State Water Board that continued research and additional data are needed to better understand the public health impacts of	See responses to Comments 6.006, 8.003, 8.018, 8.020, and 8.022.	10. CECs and Attachment A

No.	Comment	Response	Categories
	exposure to a wide range of CECs that may adversely affect public health. Metropolitan agrees that it is important to understand the efficacy of bioanalytical tools in monitoring for CECs in recycled water. However, the two proposed bioassays (estrogen receptor (ER) and aryl hydrocarbon receptor (AhR)) have not been thoroughly validated and standardized. According to the State Water Board's 2016 "Report to the Legislature on the Feasibility of Developing Uniform Water Recycling Criteria for Direct Potable Reuse" (DPR Feasibility Report), there are a number of challenges that need to be addressed before bioassays can be routinely implemented, including extraction procedures, quality assurance and quality control, standardizing methods, false-positives and false-negatives, and interpretation of results relative to human health outcomes. To date, there has not been sufficient progress to adequately address these challenges. Metropolitan supports the phased monitoring approach recommended by the CEC Science Advisory Panel in the CEC Monitoring Strategies Report. In Phase I, the Panel recommends a collection of bioanalytical screening data for three to five years using the two bioassays (ER and AhR), without imposing response actions. In Phase II, the Panel recommends a pilot evaluation of a decision framework that outlines monitoring trigger levels and response actions based on bioanalytical monitoring results. In Phase III, bioanalytical monitoring would be fully implemented with validated and certified methods for routine monitoring. Metropolitan recommends that the State Water Board incorporate this three-phased approach for bioscreening of recycled water in the Recycled Water Policy.		

No.	Comment	Response	Categories
28.006	**4. Develop standardized monitoring and analytical procedures for bioanalytical screening tools prior to imposing mandatory monitoring requirements** Metropolitan acknowledges the need for establishing a robust monitoring program to understand the impacts of CECs in recycled water. However, routine monitoring using non-standardized and inadequately validated methods may generate unreliable data. For routine monitoring utilizing bioanalytical screening tools, laboratories must have a well- developed quality assurance/quality control program, standardized operating procedures for sample collection and analysis, and standardized and validated analytical methods. Currently, the State Water Board has not published any guidance for laboratories to conduct these analyses. Without clear guidelines and standards, the likelihood of inter- company and inter-assay variability is high. For example, a single bioassay target (e.g., AhR) may be screened by three different laboratories using different cell lines, reporting systems, or assay endpoints, with no measure of how these differences might affect the results. Since the assays and often the cell lines are proprietary, there is currently little to no standardization across platforms or companies. The proposed Recycled Water Policy states that laboratories providing analysis of CECs shall be accredited by the Environmental Laboratory Accreditation Program (ELAP), if such accreditation is available. Since accreditation is not yet available, and is unlikely to be available in the near future, the onus for implementation, modification, standards development, and overall QA/QC for non-standardized methods falls on the recycled water utility. Furthermore, there is a risk of lack of comparability	See responses to Comments 1.046, 1.049, 10.009, and 14.021.	10. CECs and Attachment A

No.	Comment	Response	Categories
	between bioassay results between laboratories using pre-accreditation procedures (without having obtained validation through an established accreditation program, e.g., ELAP), versus results obtained after an ELAP accreditation program becomes available. Metropolitan recommends that the State Water Board pursue development of standardized sample collection and analysis procedures before imposing mandatory CEC monitoring and analysis with bioanalytical methods.		
28.007	**5. Remove antibiotic resistant bacteria and antibiotic resistance genes as a research topic for the CEC Science Advisory Panel report** Section 10.2 describes additional research needs for CECs and the charge for the Science Advisory Panel to guide these actions. As noted in the proposed Recycled Water Policy, every five years the panel will submit a report that describes the current state of scientific knowledge regarding the risks of CECs to public health and the environment. One of the panel's charges is to provide recommendations regarding antibiotic resistant bacteria and antibiotic resistance genes. Metropolitan agrees that additional research is required to understand the impact of antibiotic resistance but believes it should be pursued outside the water reuse framework and the Recycled Water Policy. Transmission of antibiotic resistance is primarily through direct acquisition of resistant bacteria in the community and health care facilities. Bacteria in the wider environment play a role as well, but they cannot thrive in highly treated wastewater. The DPR Feasibility Report indicated that combining secondary wastewater treatment with advanced water treatment processes is likely to reduce concentrations	The 2018 Science Advisory Panel on CECs in Recycled Water concluded that focused investigations on antibiotic resistant bacteria and antibiotic resistance genes in recycled water applications across California are needed to better understand their occurrence, fate, and risks. Thus, this will remain as a topic for consideration of the Science Advisory Panel.	10. CECs and Attachment A

No.	Comment	Response	Categories
	of antibiotic resistant bacteria and genes in recycled water to levels that are much lower than those found in conventionally treated drinking water. The DPR Feasibility Report further stated that compared to other known and potential sources, recycled water is not a significant disseminator of antibiotic resistance. Further, the CEC Monitoring Strategies Report indicated that current studies do not attribute antibiotic resistance transmission as a consequence of water reuse. Treatment processes are designed to remove and/or inactivate bacteria. Antibiotic resistant bacteria do not possess any physical properties that make them more adept to survive water treatment processes than their non-resistant counterparts. Therefore, emphasis on the relevance of antibiotic resistance in the context of CEC monitoring in recycled water is not required. A focus on the efficacy of antibiotic resistance may dilute efforts that should be targeted on other research areas that more directly apply to the protection of public health and the environment. Metropolitan recommends that the State Water Board remove research on antibiotic resistant bacteria and antibiotic resistance genes from the list of topics for the CEC Science Advisory Panel report.		

No.	Comment	Response	Categories
28.008	**6. Expand the purpose statement of the proposed Recycled Water Policy to include other forms of wastewater, in addition to municipal sources** The proposed Recycled Water Policy encourages the safe use of recycled water from municipal wastewater sources and sets a goal of increasing recycled water use to 2.5 million acre-feet per year by 2030. In section 1.1, the purpose of the Recycled Water Policy is indicated as encouraging the safe use of recycled water from municipal wastewater sources. This purpose statement does not include other sources of wastewater for recycled water use, such as wastewater generated from industrial uses including oil and gas production. Expanding the sources of wastewater reinforces the "One Water" concept and further increases California's recycled water production. Metropolitan recommends that the State Water Board expand the purpose statement of the Recycled Water Policy to include other forms of wastewater, in addition to municipal wastewater, as potential sources for recycled water use. A comprehensive graphic or matrix illustrating various sources of wastewater, and the regulatory pathways for their use as recycled water, would help both technical and non-technical stakeholders understand how to safely expand water recycling in California. Graphics as those found in the California Department of Water Resources' (DWR's) 2016 "Municipal Recycled Water – A Resource Management Strategy of the California Water Plan" report may provide a useful template.	The Amendment was changed to remove reference to "municipal" wastewater. While potable recycled water projects must come from municipal sources, CCR, title 22, Div. 4, Ch. 3 §60302 requires recycled water used for non-potable purposes to be sourced from domestic waste, in whole or part. Therefore, wastewater including both domestic and industrial wastewater could be considered recycled water for non-potable use. The Amendment was changed to clarify this. Other water can be reused, such as graywater, oilfield produced water, agricultural return water, etc.; however, the scope of this Amendment is limited to recycled water consistent with the Uniform Statewide Recycling Criteria in CCR, title 22. Therefore, the Amendment was not changed to include sources of wastewater outside what is permissible under CCR, title 22.	14. Definitions

No.	Comment	Response	Categories
28.009	**7. Consider agricultural users when tracking statewide recycled water production and usage for meeting California's recycled water goals** Section 4.3 of the proposed Recycled Water Policy tasks the State Water Board and DWR to track recycled water volume and use in California. To accomplish this task, the State Water Board and DWR will rely on annual recycled water production and use data collected by the State Water Board and the Regional Water Quality Control Boards, and urban water management plans. This section does not include recycled water use by agricultural users. According to the 2012 National Water Research Institute report, "Review of California's Water Recycling Criteria for Agricultural Irrigation", agricultural reuse in California represents approximately 37 percent (or roughly 0.24 million acre-feet per year) of the state's total recycled water use. The report further states that estimated future demand could increase agricultural reuse by a factor of 3.2 to 3.5 times current reuse levels by 2030. To meet the State Water Board's goal of increasing recycled water use by 2.3 million acre-feet by 2030, it is important that agricultural recycled water use be considered. Further, the State Water Board should ensure accurate accounting for all recycled water use throughout California. Metropolitan recommends that the proposed Recycled Water Policy include provisions to incorporate agricultural recycled water use data, in addition to urban water use, when tracking state-wide recycled water production and use.	The reporting requirements in the Amendment already require producers of recycled water to report the volume of treated wastewater distributed for agricultural irrigation and other non-potable uses per section 3.2.4 of the Amendment.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
28.010	**8. Provide funding incentives to expand the development of recycled water projects in California** The 2013 Recycled Water Policy provided funding incentives and included provisions for the use of State Revolving Funds for water purveyors, stormwater agencies, and water recyclers. However, the proposed amendments to the 2018 Recycled Water Policy omit these funding provisions. As California continues to develop recycled water projects, it is critical that the State Water Board make grants and loans available to provide an opportunity for smaller utilities to retrofit existing plants, when appropriate, to support water reuse applications, or build small-scale demonstration projects for producing recycled water. Metropolitan recommends that the State Water Board retain funding incentives within the proposed policy to further the development of local water infrastructure projects and advance research for new, innovative technologies.	In section 3.4 of the Amendment, the State Water Board requests other state agencies to promote and streamline permitting and funding of recycled water projects to assist in achieving the statewide goals outlined in section 3. State and federal funds are allocated to specific projects consistent with the intended use of those funds. To the extent recycled water projects are eligible for those funds, the State Water Board collaborates with other funding agencies to prioritize recycled water projects as appropriate. In addition, section 4 of the Amendment describes the roles of various state agencies, including the State Water Board, in funding recycled water projects. The State Water Board funds recycled water projects through its Water Recycling Funding Program. The Water Recycling Funding Program promotes water recycling by providing technical and financial assistance to agencies and other stakeholders in support of water recycling projects and research, through grants and low-interest loans from funding sources, such as Proposition 1, Proposition 64, and the Clean Water State Revolving Fund. More information can be found on the Water Recycling Funding Program webpage: https://www.waterboards.ca.gov/water_issues/programs/grants_loans/water_recycling/	4. State agency roles

No.	Comment	Response	Categories
28.011	**9. Reference California Environmental Protection Agency (CalEPA) Bill of Rights to streamline the permitting process** Section 5 of the proposed Recycled Water Policy requires recycled water projects that result in reduced stream flows to comply with Water Code section 1211 requirements for permitting. To comply with Water Code section 1211, the recycled water agencies must coordinate with the State Water Board's Division of Water Rights and Division of Financial Assistance, Regional Water Quality Control Boards, Department of Water Resources, and Department of Fish and Wildlife for permit review and approval. Currently, Water Code section 1211 process does not require regulatory agencies to conduct permit reviews within a specified timeframe. Without clear guidelines, coordination between the agencies could potentially take several years, which would delay the planning, construction, and operation of projects. The CalEPA Bill of Rights provides clear written guidance for making environmental permitting more efficient and less costly. The Bill of Rights establishes a single lead agency for permit review and requires the various approval agencies to establish time limits for permit reviews. This allows a streamlined permitting process and avoids unnecessary delays when seeking to implement a recycled water project. Metropolitan recommends that the proposed policy conforms to the CalEPA Bill of Rights to streamline the permitting process for recycled water projects.	While Water Code section 1211 process falls under the approval authority of Division of Water Rights, the Division is committed to working closely with other permitting entities, namely the Regional Water Quality control board to ensure there is a clear and stepwise approval process in place. The addition of the "determination" step to the process will allow for early identification of recycled water projects and programs that will require coordination between the Division of Water Rights and the Regional Water Boards. Also see the response to Comment 7.006.	5. 1211 and WW Change Petitions
28.012	We believe that the additions and clarifications noted in our comment letter will result in a well-defined policy that is clear and implementable, while furthering California's potable reuse development in a manner protective of public health.	This is the concluding statement of the comment letter, preceded by Comments 28.001 to 28.011.	12. General Comment

No.	Comment	Response	Categories
29	**Napa Sanitation District** **Commenter: Timothy B. Healy**		
29.001	Thank you for the opportunity to comment on the proposed amendment to the Recycled Water Policy. The Napa Sanitation District (NapaSan) is an independent special district seNaparving a population of 82,700 in the City of Napa and surrounding unincorporated areas. NapaSan treats an average of 9 million gallons of wastewater each day, and produces unrestricted "tertiary" quality recycled water for irrigation of landscaping, industrial parks, golf courses, pasture lands, feed and fodder crops, a cemetery, **Napa** Valley College ball fields and landscaping, a recreational park, Napa State Hospital, and drip irrigation of vineyards. NapaSan has been producing and delivering tertiary quality recycled water for over 20 years. We understand the State Water Resources Control Board wishes to encourage more water recycling to help alleviate emergency drought conditions. We support this goal. However, there are several elements of the proposed amendment that are unworkable or impractical. Our comments are shown in detail below.	This is the introductory statement to the comment letter, followed by Comments 29.002 to 29.012 .	12. General Comment
29.002	**1. Reporting of influent, recycled water production, and treated wastewater conveyed to receiving water should only be reported on an annual basis.** These values are already being reported to the State Water Board on a monthly basis, through the California Integrated Water Quality System (CIWQS) database. It would be duplicative reporting, and a waste of scarce public resources, to require the exact same information to be reported twice to the *same* agency. NapaSan can support annual reporting of this information, but not monthly.	See responses to Comments 1.037 and 2.100 The Amendment was revised to require annual reporting of monthly data to the State Water Board.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
29.003	**2. Reporting of recycled water volume by use in the proposed amendment is not feasible.** Recycled water is delivered to customers, not uses. And most customers only have one meter that measures recycled water for multiple uses. For example, a winery has a vineyard (agricultural irrigation) and usually also has significant landscaping (landscape irrigation). The customers do not measure where the water goes by use. Collecting data on the types of uses is impractical and not at all feasible. Further, to install many additional meters to quantify recycled water by uses would be very burdensome to both the customers and to NapaSan, both financially and for the additional workload of reporting. Potable water agencies do not report where their potable water goes by use, because it would be incredibly burdensome to do so. Recycled water agencies should not be required to report use data either. In addition, if the State Water Board creates a requirement for additional metering and reporting by use, it will discourage existing and future users from participating in the recycled water program which runs counter to the stated goal of the State Water Board, namely to increase recycled water use.	Section 3.2 of the Amendment is intended to make collection and reporting of recycled water related data less onerous for both producers and state agency staff by replacing the need for resource intensive surveys. Logistics of the reporting requirements are being developed alongside the survey tool, so it is speculative that these reporting requirements would result in additional metering. The State Water Board intends to base the data collection methods off the 2015 municipal wastewater recycling survey, and with an understanding of where and how the facilities track the requested information. The State Water Board plans to develop the reporting system in collaboration with the agencies to which these requirements will apply.	3. Goals, mandates, and reporting requirements
29.004	**3. Reporting requirements in the Recycled Water Policy should only be changed after due public process.** The proposed amendment indicates that the Executive Director of the State Water Board would be able to "establish mandates as necessary" (markup version, page 3, section 3.2) with respect to changing reporting requirements. Mandates must *never* be promulgated by the Executive Director or any other public official, for reporting requirements or any other element of the Recycled Water Policy or associated directives,	Changes were made to section 3.2 of the Amendment to remove the phrase “or establish mandates” in response to comments received. Section 3.2 of the Amendment was also revised to explicitly reference the sections of the Water Code that authorize the Executive Director of the State Water Board to revise reporting and monitoring requirements outside of an amendment or public process. The reporting requirements are included as part of this amendment process which has been developed in compliance with the established public	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	without due public process. Due public process is a very basic California tenet and should be upheld, and *endorsed*, by the State Water Board.	process requirements. The essential elements of due process are notice and an opportunity to be heard. Grannis v. Ordean (1914) 234 U.S. 385, 34 S. Ct. 779, 58 L. Ed. 1363. As described in response to Comment 13.003, the State Water Board has provided notice of the proposed Amendments to the public and provided an opportunity to comment. Consequently, due process requirements are satisfied. The commenter's reference to "establish mandates as necessary" refers to future possible action by the State Water Board. Such action, if any, would likewise include public notice and an opportunity to comment before any mandates would be imposed.	
29.005	**4. Regional general orders should be allowed if Title 22 requirements are met.** The proposed amendment indicates that all regional orders will terminate one year from the adoption of the Recycled Water Policy amendment, claiming (without substantiation) that regional orders are not consistent with certain other requirements, and most notably Title 22 requirements. This statement is *completely false*. The San Francisco Bay general water reuse requirements (Order No. 96-011) specifically indicates that "Revisions to Title 22 shall become part of this Order automatically upon final adoption of those revisions" (96 -011, page 2). Moreover, there have not been problems with the recycled water programs in the San Francisco Bay region. Requiring the termination of a successful regional order is completely unnecessary and a waste of public resources.	Some permits under regional water board orders may be inconsistent with current regulations and policies. The purpose of transitioning enrollees is to create statewide consistency in the permitting of recycled water projects, to better manage limited staff resources, and improve efficiency for permittees by reducing redundancy in permit development. Through use of State Water Board Order WQ 2016-0068-DDW, any future updates to permit requirements would be conducted at the statewide level rather than requiring redundant efforts by each of the nine regional water boards, thereby reducing resource impacts in the long-term. Furthermore, the commenter references Order No. 96-011, which was adopted more than 20 years prior to the adoption of Order WQ 2016-0068-DDW, 13 years prior to the Recycled Water Policy, and four years prior to the update to CCR, title 22. Water Code section 13263(e) requires all Waste Discharge Requirements be reviewed periodically.	11. Permit review and update

No.	Comment	Response	Categories
29.006	**5. The proposed amendment should indicate that vineyard irrigation does not represent a significant component of the salt and nutrient balance in a groundwater basin.** The staff report for the proposed Recycled Water Policy amendment indicates that "the use of recycled water for landscape irrigation does not typically represent a significant component of the salt and nutrient balance in a groundwater basin" (staff report, p. 63). This statement should also be made about vineyard irrigation, which literally takes irrigation at one-tenth the volume of landscape irrigation. Vineyard owners have incentive to minimize water use for increasing the inherent quality (cru), balance, flavor, body, and bouquet of wine. Furthermore, in the NapaSan service **area**, there is a charge for recycled water per 1,000 gallons of usage. This cost of recycled water is a significant disincentive for using a volume of recycled water that would travel beyond the root zone of plants.	The Staff Report with SED was changed to reflect this comment regarding irrigation of vineyards.	6. Salt and nutrient management plans
29.007	**6. State agencies must work together to coordinate needs of Salt and Nutrient Management Plans (SNMPs) and Sustainable Groundwater Management Act (SGMA) reports.** There are many overlapping elements of SNMPs and the reports due under SGMA. The staff report indicates that these two planning efforts must remain separate due to "a lack of statutory authority by Department of Water Resources to evaluate SNMPs for consistency with the Policy and applicable basin plans" (staff report, p. 57). NapaSan requests that language be added to the amendment to place salt and nutrient planning on hold until a satisfactory solution can be worked out either legislatively or through inter-agency coordination to implement a non-duplicative work effort	The Amendment addresses potential duplication of effort between these programs by allowing regional water boards to accept SNMPs that are "functionally equivalent" to an SNMP. SNMPs have been prepared for the majority of high-priority basins, and additional SNMPs are in progress. Based on these considerations, Staff does not believe that halting the SNMP program at this time is advisable. In regard to the relationship between the SNMP program and SGMA, see response to Comment 1.027 and section 3.4.4 and 4.8.4 of the Staff Report with SED.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	for SNMPs and SGMA. The burden of duplicative efforts should not be placed on local agencies for the discrepancies and redundancy in these programs. The State Water Board must coordinate with the Department of Water Resources to streamline these requirements, not make them more complicated with a wholly separate SNMP program that substantially overlaps with SGMA.		
29.008	**7. A Change Petition Should Not Be Required for Wastewater Discharges to Tidal Waterbodies.** When NapaSan is not recycling, discharge of treated wastewater is conveyed to a tidal portion of the Napa River approximately ten miles downstream from the point at which fresh water meets tidal water. As a result, the water in the Napa River in the vicinity of, or upstream or downstream from, the discharge is not suitable for potable or agricultural uses.	See response to Comments 1.050 and 1.051. Discharges to water courses subject to wastewater change petitions pursuant to water code section 1211 are those water ways defined as waters of the State of California. Per Water Code section 1201, all water flowing in an natural channel is public water of the State. The Napa River, as with other coastal streams, is therefore generally subject to State Water Board water rights authority from the mouth of the river to the headwaters, inclusive of all hydraulically connected tributaries. Subdivision (b) of Water Code section 1211 provides a narrow exception for "discharge or use of treated wastewater that do not result in decreasing the flow in any portion of a watercourse." Staff are available to assist dischargers in determining whether specific circumstances, are within the scope of this limited exception. Limitations or costs of treatment that may be needed to make brackish water available for potable or irrigation purposes is not a basis for an exemption from water code section 1211. It is suggested that the commenter contact the Division of Water Rights to evaluate the specific circumstances surrounding this comment to evaluate whether a wastewater change petition is required in this situation.	5. 1211 and WW Change Petitions
29.009	In addition, the amount of water diverted for recycled water use is negligible in an aquatic life or biological context due to the overwhelming hydrodynamics of the tides in this significant estuary. Not surprisingly, the points of diversion for water rights	See response to Comment 29.008.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
	holders along the Napa River occur many miles upstream of the Soscol Water Recycling Facility, according to the eWRIMS database. The fact that all points of diversion are miles upstream from the discharge point is evidence that the location of NapaSan's discharge is impacted by salt water so often and to such extent that no one even tries to divert water for beneficial use in the **area**. As a result, Water Code 1211 should not apply, and a "Petition for Change" form should not be required for water recycling projects implemented by NapaSan with water produced at the NapaSan's Soscol Water Recycling Facility. The change petition process is overly burdensome and costly in this circumstance, with no apparent benefit.		
29.010	In order to maximize the encouragement of recycled water use in a way that also protects human health and the environment, NapaSan specifically requests that discharges to tidal waterbodies diverted for use as recycled water under this permit not be subject to Water Code Section 1211. It is our understanding that the State Water Resources Control Board has the discretion to make this decision.	See response to Comment 29.008.	5. 1211 and WW Change Petitions
29.011	**8. It is inappropriate to call treated wastewater discharged to receiving waters "disposal."** If the State Water Board is going to require wastewater change petitions for removing treated wastewater from receiving waters because there is a potential benefit to aquatic life with the water, then that water should not be called "disposal." In addition, the term "disposal" is brand new in this context and suggests that the water is being "dumped." Our municipal agency takes great pride in treating its wastewater to very high standards	In response to this comment, the term “disposal” was changed to “discharge” in section 3.2.3 of the Amendment.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	in the service of our public citizens for the protection of aquatic life and human health, and we object to the negative connotation of the word, for a resource that provides benefits. We hereby request that the term "discharge" or "release" be used instead.		
29.012	**9. Priority pollutant monitoring should be removed from Order WQ 2016- 0068 DOW.** We support the State Water Board's removal of priority pollutant monitoring requirements in the proposed Recycled Water Policy amendment. Prior to any deadline for permittees to enroll in WQ 2016-0068 DDW, the priority pollutant monitoring requirements should be removed, for consistency with the Recycled Water Policy.	See response to Comments 1.045 and 11.007.	11. Permit review and update
30	**Orange County Sanitation District** **Commenter: Ron Coss**		
30.001	Orange County Sanitation District (OCSD) is a large wastewater district in Southern California that partners with the Orange County Water District (OCWD) in providing over 100 million gallons per day (MGD) of potable recycled water for the Groundwater Replenishment System (GWRS). This is a partnership and one of the largest recycled water projects in the United States. As the supplier of secondary treated wastewater to the GWRS, OCSD has a strong and vested interest in ensuring the quality, safety, and reliability of its feedwater for potable reuse. To this end, OCSD is grateful for the opportunity to review and provide comments on the State Water Resources Control Board's proposed Recycled Water Policy Amendment. We support the science-based recommendations and findings provided by the Science Advisory Panel and the Board's mission to protect human health through recycled water quality	The comment is an overarching statement; specific comments are addressed in Comments 30.002 to 30.020.	10. CECs and Attachment A

No.	Comment	Response	Categories
	monitoring. However, we believe that certain key recommendations provided by the Science Advisory Panel were omitted in the draft Policy amendment and should be reconsidered for inclusion. We would appreciate your time in reviewing our comments and reconsidering a few important points.		
30.002	**Bioanalytical Methods for CEC Monitoring** OCSD supports the use of cell bioassays as a tool to monitor for the presence of unknown CECs in recycled water, and believes that this technique can complement current targeted methods in CEC monitoring. We agree with the Science Panel that the methods are standardized and ready to help guide monitoring efforts. However, we have several concerns about the bioanalytical testing requirements as stated in the proposed amendment of the Recycled Water Policy.	Comment noted. Specific concerns are addressed in responses to Comments 30.003 to 30.011.	10. CECs and Attachment A
30.003	1. Cell bioassays have not been used by most water or wastewater agencies, and they have not been regularly performed by agency and laboratory staff. Therefore, we ask that you consider allowing a one-year grace period following adoption of the Policy amendment before implementation of the initial monitoring phase. This would allow laboratories to prepare for these tests by procuring funds for large capital equipment (e.g., microplate readers and incubators) and supplies, and for staff to demonstrate competency with the method. This period would also allow laboratories to conduct calibration exercises and limit of detection (LOD) studies that will ultimately result in reliable and consistent data. The wastewater, recycled water and drinking water communities pride themselves on taking a proactive and responsible approach to conducting business and protecting human health. Allowing our agencies to adequately prepare and practice the methods for a short one-year	See response to Comment 6.006.	10. CECs and Attachment A

No.	Comment	Response	Categories
	defined timeframe will ensure the protectiveness of bioanalytical methods is upheld as intended.		
30.004	2. There are currently only a few laboratories that can perform commercial testing for cell bioassays. Allowing a one-year grace period following adoption of the Policy amendment before implementation of the initial monitoring phase not only allows staff to budget for equipment and practice the new methods, it will also provide needed time for more agencies and commercial laboratories to begin building new laboratories for this impending requirement. This is important from a financial feasibility perspective to ensure monitoring costs are reasonable and not inflated due to an inadequate competitive market for sample analysis. For it to be possible for new laboratories to build, the State Water Board must incentivize and encourage this growth and allow a reasonable and specific timeframe before implementation. We believe the one-year grace period would significantly help.	See response to Comment 6.006.	10. CECs and Attachment A
30.005	Additionally, the State Water Board currently has no minimum requirements outlined in the draft amendment on what will qualify as a State-approved laboratory for bioanalytical testing. OCSD encourages the State to cite the minimum requirements so that there is clear understanding for new labs to start building a competitive market and for agencies to begin testing in-house. This would help alleviate State-wide concerns by all parties regarding the current lack of laboratories to complete the analysis work for bioanalytical monitoring.	The State Water Board will work with the regional water boards and stakeholders as resources allow to develop portions of the QAPP, including data quality objectives and data quality indicators for the CEC Monitoring Parameter in Attachment A. See section 4.14.4 of the Staff Report with SED and response to Comments 1.046, 1.049, 6.006, 14.011, and 14.012.	10. CECs and Attachment A
30.006	3. OCSD supports the Science Panel's recommendation of a phased, performance-based approach for implementing the CEC monitoring programs and a multi-tiered framework for interpreting	See responses to Comment 8.003, 8.018, and 8.020.	10. CECs and Attachment A

No.	Comment	Response	Categories
	the resulting data. That recommended framework allowed for a flexible, adaptable response to increase or decrease monitoring requirements, and it provided cost-effective means for incremental data gathering. OCSD was disappointed that the State did not move forward with the Panel's recommendations as they represent the expert opinion and had Stakeholder buy-in to that process. The phased approach described in the draft Policy amendment does not have the same intentions or value as that proposed by the Science Panel. Specifically, the Science Panel proposed that the goal of the Initial Phase of monitoring (Phase I) would be as a data collection exercise to determine the range of responses standardized for water quality monitoring. More importantly, the Panel determined that the data collected in Phase I could then be used to more appropriately determine trigger limits relevant to human health, as well as to guide the interpretive framework for cell bioassay results. This recommendation was made because the Science Panel explicitly stated that it was premature to include trigger levels at this time.		
30.007	OCSD respectfully requests that the State Water Board reconsider the recommendations of the Science Panel and remove trigger limits in the initial Phase I of monitoring (year 1 of the monitoring program). The requirement to perform cell bioassays without trigger limits will not lessen the regulatory charge, but will provide agencies with the confidence to perform initial bioassays and gather the data needed for the State Water Board to evaluate and determine more relevant trigger limits for Phases II and Ill.	See responses to Comment 8.003, 8.018, and 8.020.	10. CECs and Attachment A

No.	Comment	Response	Categories
30.008	4. The requirements for bioanalytical trigger limits, especially for the initial phase (year 1) of CEC monitoring as mentioned previously, is concerning. The arbitrarily low trigger limit for the aryl hydrocarbon (AhR) bioassay is cause for alarm. The proposed trigger limit is set at the reporting limit. Laboratories will have difficulty in reporting data below the trigger limit/ reporting limit because data below the reporting limit are estimations. Unlike the estrogen receptor alpha (ER-a) bioassay, there does not seem to be reasonable justification for the AhR trigger limit determination.	The phased monitoring approach and response actions for the bioanalytical screening tools is now is consistent with the recommendations for the 2018 Science Advisory Panel, with the exception that the State Water Board included a monitoring trigger level for AhR that is policy-based and not health-based. Further discussion can be found in the Phased Monitoring and Data Evaluations subsection in section 4.14.2 of the Staff Report with SED.	10. CECs and Attachment A
30.009	OCSD supports the Science Panel's recommended trigger limit for the estrogen receptor alpha (ER-a) bioassay. However, the Science Panel was clear that a health-based trigger limit had not yet been developed for the AhR bioassay.	See response to Comment 30.008.	10. CECs and Attachment A
30.010	OCSD recommends that the State Water Board adopt the Science Panel's recommendation to delay implementing a trigger limit for the AhR bioassay until a peer review panel of experts determines a Predicted No Effect Concentration (PNEC) for human health for this bioassay. OCSD supports performing AhR bioassays in all monitoring phases to help move the science forward to attain appropriate limits in the future.	See response to Comment 30.008.	10. CECs and Attachment A

No.	Comment	Response	Categories
30.011	5. The language for response actions after an exceedance of a trigger limit is too broad and vague as currently written. OCSD recommends clarifying the response actions to include examples of frequency and duration of testing, similarly to the language provided in National Pollutant Discharge Elimination System (NPDES) permits that require accelerated testing when aquatic toxicity bioassays exceed permit limits. We believe that this would at least provide utilities with an understanding of the extent of follow-up actions in the event of a trigger limit exceedance in Phases II and Ill of monitoring, and would help them better allocate resources and prepare for additional testing.	See responses to Comment 10.027 and 28.004.	10. CECs and Attachment A
30.012	**Data Collection/ Analysis** OCSD agrees with and would like to support the larger stakeholder community in the request to uphold the Science Panel's recommendation for the formation of a bioanalytical advisory group. OCSD suggests including language in support of the formation of an advisory group made up of voluntary CEC Science Panel members, stakeholder members, bioanalytical experts, commercial laboratories, and State Water Board staff. We believe that by including language supportive of this effort in the Policy amendment, it would accelerate information sharing to the benefit of all stakeholders and to the State.	See response to Comment 8.016.	10. CECs and Attachment A

No.	Comment	Response	Categories
30.013	At the recent Bioanalytical Screening of Recycled Water Workshop held at SCCWRP on June 11, it was clear that an education bridge was needed between the SCCWRP science team/State Board staff and the stakeholders who would be participating in the new program. The advisory group would provide a mechanism between those important groups to accumulate guidance and assistance in many of the technical issues that have caused concern for stakeholders, including extraction and method protocols, interpretation of data, and quality control guidelines. Moreover, the volunteer based advisory group could be used as a platform to organize intercalibration exercises between agencies and laboratories State-wide.	See responses to Comments 8.016 and 8.022.	10. CECs and Attachment A
30.014	A bioanalytical advisory group in the Policy amendment would be important to all as data is gathered in the preliminary stages of implementation and would enhance ongoing and future guidance and recommendations related to the Policy moving forward. The Science Panel and the stakeholders strongly recommend a volunteer-driven process and stakeholders across various agencies are willing to give the State Water Board a strong commitment to provide time and resources towards this effort.	See responses to Comments 8.016 and 8.022.	10. CECs and Attachment A
30.015	At this time, it remains unclear if the State Water Board has the funding, staff, time, or resources to immediately implement the data portal program recommended by the Science Panel. The final recommendations do not mention what resources or data portal system will be used. OCSD does support the data process recommended by the Science Panel, however, no clear system or pathway is outlined in the policy.	The State Water Board can implement the Panel's recommendations on its own initiative without having language specified in a Policy. The Policy states the intent of the State Water Board, but overly detailed or descriptive narratives of implementation do not belong in the Policy. Some of these have been addressed in the Staff Report with SED, while others will occur through separate Water Board efforts as the Water Board continues to work with stakeholders to implement the Panel's recommendations.	10. CECs and Attachment A

No.	Comment	Response	Categories
30.016	For this reason, OCSD suggests that the first phase of data collection be an initial voluntary bioassay data collection period and that SCCWRP be hired to help organize the technical advisory group of volunteers. Advisory members from academia, wastewater, drinking water, and regulatory agencies could initially go through the voluntary data and assess the results and feasibility of data collection, as well as standardize formats and data submissions.	See responses to Comments 8.016, 8.018, and 8.020.	10. CECs and Attachment A
30.017	This trial period would give everyone time to build a database system, understand the process and work out the challenges before appropriate permittees State-wide are participating. Everyone in this process needs time to prepare and test the new system and figure out how to submit the data.	This seems to confuse the reporting requirements in section 3 of Attachment A with the requirement in section 1.3 of Attachment A to submit all of the CEC monitoring data electronically. The State Water Board is developing a recycled water reporting system that will likely use a web-based interface to submit the data in section 3 of the Amendment. The State Water Board will reach out to targeted stakeholder groups to pilot the reporting system. This is separate from the reporting requirements in attachment A where recycled water producers will submit the CEC monitoring data electronically to an existing database (e.g., CIWQS or Geotracker).	10. CECs and Attachment A
30.018	We recommend that the State and the new Advisory Group schedule a series of data workshops to help stakeholders with permit required data submissions.	See responses to Comments 8.016 and 8.031 regarding the Bioanalytical Advisory Group. Data submission will be through existing databases that many permittees are familiar with (and which have existing Help Desks). We do not anticipate a need for data submission workshops.	10. CECs and Attachment A

No.	Comment	Response	Categories
30.019	OCSD supports a phased, performance-based approach for implementing the CEC monitoring program and a multi-tiered framework for interpreting the resulting data. This suggested framework will allow for a flexible, adaptable response in monitoring requirements, and it provides cost-effective means for incremental data gathering. We appreciate that the State recognizes the need to prioritize time, cost, and staff resources into monitoring efforts for public health, and it has developed a framework that is feasible, responsible, and ensures a meaningful process. We are also in agreement with the CEC compounds that were added and removed in this updated draft report.	The commenter supports the additions and removals of the CEC compounds in Table 1 of Attachment A.	10. CECs and Attachment A
30.020	In summary, we ask that the State please consider the following: 1) Provide agencies time to prepare: a. One year to set up labs, purchase equipment, perform intercalibration studies, practice methods, learn how to submit data b. Make the initial phase, or first year, a data submission period without trigger limits and review the submitted data for trends and to determine more appropriate trigger limits moving forward c. Do not include trigger limits for AhR bioassay during Phase I (there is no basis for the proposed limit) 2) Develop science-based trigger limits for AhR bioassay to start in Phase II 3) Determine minimum requirements for in-house laboratories and commercial laboratories 4) Incentivize the program for agencies to start in-house bioassay testing 5) Provide more clarity on testing frequency and duration after a trigger limit exceedance 6) Form a Bioanalytical Advisory Group to help educate, collaborate, and keep moving the science behind the CEC program forward in a stakeholder-	(1a.) See response to Comment 6.006. (1b.)The initial phase for the constituents in Table 1 and Table 2 (targeted CECs and surrogates) is one year. The initial phase for the bioanalytical screening tools in Table 3 is now 3 years long. See response to Comment 8.003 regarding the response actions. (1c.) See response to Comment 8.044. (2) See response to Comment 30.008. (3) See responses to Comments 14.011 and 14.012. (4) Incentives to monitor are not needed or appropriate since Attachment A requires monitoring using bioanalytical screening tools. (5) Tables 8 and 10 in Attachment A were revised to include that resampling should be done within 72 hours of notification of the result. (6) See response to Comment 8.016.	10. CECs and Attachment A

No.	Comment	Response	Categories
	driven process OCSD is actively engaged with SCCWRP on many collaborative research-based projects including CECs and bioassay development. We look forward to continuing to support the State and help move the CEC program forward in line with the Science Panel's recommendations and encourage the State Water Board to adopt and follow the Science Panel's guidance.		
31	**Orange County Water District** **Commenter: Jason Dadakis**		
31.001	Orange County Water District (OCWD) staff is pleased to comment on the State Water Resources Control Board's (State Board's) proposed Recycled Water Policy Amendment. OCWD is the public agency responsible for groundwater resource management in the Orange County Groundwater Basin. We represent the interests of more than 20 cities and retail water agencies that serve groundwater to nearly 2.5 million people in northern Orange County. In partnership with the Orange County Sanitation District, OCWD operates the Groundwater Replenishment System (GWRS), the country's largest indirect potable reuse project that provides 100 million gallons per day (MGD) of purified recycled water for groundwater recharge under permit from the Santa Ana Regional Water Quality Control	This is the introductory statement to the comment letter, followed by Comments 31.002 to 31.025.	12. General Comment

No.	Comment	Response	Categories
	Board (RWQCB) and the Division of Drinking Water (DDW). We also operate the Green Acres Project (GAP), a non-potable reuse project that supplies recycled water for landscape irrigation. OCWD staff has historically supported the State Board's science-based process to inform constituents of emerging concern (CEC) monitoring requirements for recycled water, going back to the original 2009 Recycled Water Policy and the resulting first Science Advisory Panel (Panel) convened thereafter. We also generally support the State Board's efforts to update and clarify the provisions of the existing Recycled Water Policy, inasmuch the changes enhance the development of recycled water supplies to meet the amended Policy's ambitious goals.		

No.	Comment	Response	Categories
31.002	However, we are concerned with many of the changes and additions to the Policy's CEC monitoring requirements for potable reuse projects found in Attachment A, especially those related to the implementation of bioanalytical monitoring. Our concerns stem primarily from the significant deviations from the Final Report issued by State Board's Science Advisory Panel, entitled "Monitoring Strategies for Constituents of Emerging Concern (CECs) in Recycled Water" (Final CEC Panel Report)[1]. One source of these deviations was revealed at the June 19th Public Hearing, when State Board staff stated that important provisions within the proposed Recycled Water Policy Amendment were based on the earlier Draft CEC Panel Report issued on January 31st and that these had not been updated to reflect the recommendations within the Panel's Final Report. This approach is concerning, as it undermines the long-held consensus between the State Board and its stakeholders for convening the Panel, as codified in the 2009 Recycled Water Policy; namely, to "guide future actions relating to [CECs]". We are willing to accept the concept of bioanalytical monitoring at our potable reuse facility, but to instigate such monitoring without following the Final CEC Panel Report's implementation guidance is unwise and unjustified, and will cause significant resources to be expended to generate data of uncertain quality that can trigger regulatory actions.	See responses to Comments 8.003, 8.018, and 8.020.	10. CECs and Attachment A

No.	Comment	Response	Categories
31.003	Our specific concerns and suggested modifications are described below. Section 5.3 (Evaluation of Bioanalytical Screening Tool Results) of Attachment A contains requirements for the project proponent or recycled water producer to perform specified Response Actions based on the results required bioanalytical screening tool monitoring results. Table 9 presents the Required Equivalency of Agonists and Monitoring Trigger Levels for Bioanalytical Screening Tools and Table 10 lists Bioanalytical Equivalent Concentration (BEQ) to Monitoring Trigger Level (MTL) ratios with accompanying required Response Actions. As presented below, the inclusion of Response Actions and Monitoring Trigger Levels for Bioanalytical Screening Tools conflicts directly with the clear and unambiguous recommendations found in no less than eight parts of the Final CEC Panel Report, as well as additional recommendations found within subsequent correspondence between State Board staff and the Panel:	See responses to Comments 8.003, 8.018, 8.020, and 10.027.	10. CECs and Attachment A
31.004	• pg. xi, Executive Summary of Final CEC Panel Report: *"While the Panel has outlined a process to interpret and respond to in vitro bioassay results**, this process is not sufficiently mature to justify response actions at this time**. Thus, the Panel recommends a phased implementation of bioanalytical screening, with Phase I consisting of a three to five-year data collection period, **with no response actions required during this time**."* • pg. x, Executive Summary of Final CEC Panel Report: *"As interpretive guidance for bioscreening data is not yet mature*, ***response actions such as identification of bioactive chemicals…should not***	See responses to Comments 6.006, 8.003, 8.016, 8.018, 8.020, and 10.027.	10. CECs and Attachment A

No.	Comment	Response	Categories
	be required during the data collection phase. *"* • pg. 75-76, Section 7.3 – Interpreting Bioanalytical Results, Final CEC Panel Report: *"The Panel recognizes that* ***establishing screening-level thresholds and a robust interpretive framework are in their infancy*** *and are subject to improvement and refinement as more IVB monitoring data are collected and evaluated. Thus, the Panel believes it is* ***premature to require any such actions in response to bioassay results*** *during the first phase of IVB data collection…"* • pg. 78, Section 7.3.3 – Interpreting Appropriate Response Actions to Bioscreening Results, Final CEC Panel Report: *"Absent the benefit of established IVB MTLs and recycled water IVB data,* ***the Panel felt it was premature to propose a framework describing appropriate responses to varying BEQ/MTL ratios at this time***." • pg. 81, Section 7.4.1 – Phase I Recommendations for Monitoring of Potable Reuse Projects, Final CEC Panel Report: *"Whereas interpretive guidance for bioanalytical screening results are provided in section 7.3,* ***the Panel believes that requiring response actions to screening results for the Phase I data collection exercise is premature."*** • pg. 82, Section 7.4.3 – Bioscreening Implementation Advisory Group, Final CEC Panel Report*: "…****requiring response actions during the initial data collection phase is premature and thus not appropriate****, until such methods are fully validated and certified by the appropriate entities [e.g. the State Water Board's Environmental Lab Accreditation Program (ELAP)], and that the* ***interpretive framework outlined in 7.3***		

No.	Comment	Response	Categories
	has matured and has been subject to a critical evaluation by water quality experts, State Water Board personnel and stakeholder representatives.” • pg. 83, Section 7.6 – Conclusions, Final CEC Panel Report: ***“However, the Panel feels that requiring response actions during Phase I data collection is premature.”*** • pg. 102, Section 9.4 – Updated 2018 CEC Monitoring Recommendations for Potable Reuse Practices: “…***the Panel feels that requiring response actions to bioassay results is premature at this time.”*** • pg. 1, Memorandum on Bioanalytical Monitoring Trigger Levels2: *“At this time, the Panel also stresses that their recommendations for bioscreening* ***should not be misconstrued as suitable for incorporation into the [Recycled Water Policy] as a regulatory limit for compliance*** *but rather, as noted above, for screening level analysis only. For example****, the term “action level” in the current draft report could lead to misinterpretation of the Panel’s intent****, even though the steps for interpreting bioscreening results are clearly delineated in the draft report (see Section 7.5.3)* ***as adaptive, flexible, non-binding and non-regulatory.”***		

No.	Comment	Response	Categories
31.005	Within both the proposed Recycled Water Policy Amendment and its accompanying draft staff report, as well as during the Bioanalytical Screening of Recycled Water Workshop held at SCCWRP on June 11th, State Board staff have cited the current requirement for Response Actions and Monitoring Trigger Levels to evaluate CEC monitoring results from targeted analytical chemistry methods as the basis for adopting equivalent Response Actions for bioanalytical monitoring results. However, this assigns a false equivalence between targeted analytical chemistry methods and bioanalytical screening tools as applied to recycled water monitoring; the analytical chemistry methods were significantly more established, standardized, and mature when targeted CEC monitoring was made a requirement within the 2013 Recycled Water Policy, and are even more standardized today, as compared to the relative immaturity of bioanalytical screening tools applied to regular recycled water compliance monitoring.	See response to Comment 30.008. Further discussion of the inclusion of the trigger levels for bioanalytical screening tools can be found in the Phased Monitoring and Data Evaluations subsection in section 4.14.2 of the Staff Report with SED.	10. CECs and Attachment A
31.006	The draft State Board staff report also claims that *"Providing monitoring trigger levels to compare bioanalytical screening tool results to and response actions for different levels of bioanalytical results provides context for the results and why there is a need for monitoring with bioanalytical screening tools. If monitoring trigger levels, which are thresholds of concern based on human health effects, were not included, then the need to monitor with bioanalytical screening tools would not be clear."* (pg. 73, Section 4.14.2). In actuality, the State Board has numerous other options to require the collection of bioanalytical data from recycled water projects without requiring Response Actions and Monitoring Trigger Levels. One such approach that deserves consideration is the implementation of an Unregulated Contaminant	See response to Comment 30.008.	10. CECs and Attachment A

No.	Comment	Response	Categories
	Monitoring Rule (UCMR) style program, such as those previously administered by both the State of California and USEPA to assess drinking water. Such an UCMR program could require specified bioanalytical monitoring in recycled water for a limited period of time. Like the drinking water UCMR, it could require laboratories to first demonstrate proficiency with bioanalytical techniques according to established protocols ahead of performing the required monitoring and analysis, with results reported to the State.		
31.007	**As such, we concur with the Final CEC Panel recommendations that the inclusion of Response Actions and Monitoring Trigger Levels for bioanalytical screening tools is premature and not appropriate, and therefore request that they be removed from the proposed Recycled Water Policy Amendment.** At the very least, any Response Actions included in the Policy should be limited to supplementary data collection actions only (e.g., repeat sampling or split-sampling if certain thresholds are exceeded), as this would be consistent with the Final CEC Report recommendation for the initial phase of required bioanalytical monitoring be focused exclusively on data collection. Furthermore, previous State and USEPA UCMR drinking water monitoring programs provide a model for implementing bioanalytical monitoring without Response Actions and Monitoring Trigger Levels.	See responses to Comments 8.003, 8.018, 8.020, and 30.008.	10. CECs and Attachment A
31.008	**2. Ignoring the Panel's Recommended Phased Approach for Bioanalytical Tool Monitoring Implementation** The Final CEC Panel Report recommends a very methodical, deliberate, and carefully considered approach to the implementation of bioanalytical monitoring for recycled water. This approach is clearly described in Section 7.4 (Phased Implementation of	This is an introductory statement to Comments 31.009 to 31.015.	10. CECs and Attachment A

No.	Comment	Response	Categories
	Bioscreening of Recycled Water) and features three phases:		
31.009	• **Phase I:** a data collection exercise to determine the range of responses for IVBs standardized for water quality monitoring (i.e. Stage 3 of (sic) higher in Table 7.2) and that represent endpoints relevant to human health in designated samples from recycled water facilities across the state. A review of the bioscreening data collected during Phase I by the Panel is recommended at the end of the Phase I data collection period. • **Phase II**: a pilot evaluation of the interpretive framework for bioanalytical monitoring results (described in section 7.3), with initial MTLs established to further guide appropriate response actions geared toward ensuring a high quality of recycled water. • **Phase III:** full implementation of bioanalytical monitoring, where validated and certified bioanalytical methods would be an integral component of routine screening/monitoring of recycled water quality.	Comment noted. The comment restates information from the Panel.	10. CECs and Attachment A

No.	Comment	Response	Categories
31.010	The "phased monitoring" approach within the proposed Recycled Water Policy Amendment is an entirely different construct as compared to these Panel recommendations. It simply takes the monitoring frequencies currently required for targeted analytical chemistry monitoring for CECs and applies them to bioanalytical tool monitoring: • Initial Assessment: One year of quarterly monitoring • Baseline: Three Years of semi-annual monitoring • Standard Operating: Ongoing semi-annual monitoring	See response to Comment 8.003, 8.018, and 8.020.	10. CECs and Attachment A
31.011	Figure 1 below, also presented by stakeholders[3] at the June 11th Bioanalytical Screening of Recycled Water Workshop held at SCCWRP, presents the differing "phased" approaches proposed by the Final CEC Panel Report and the Recycled Water Policy Amendment. Figure 1: Comparison of Panel & Draft Recycled Water Policy Implementation	Comment noted. Comment is a statement and no response is needed.	10. CECs and Attachment A
31.012	The "phased monitoring" within the currently proposed Recycled Water Policy Amendment again implies a false equivalence between the current status of targeted analytical chemistry monitoring for CECs and bioanalytical tools. It ignores the current lack of standard protocols and procedures for the sampling, preservation, extraction, measurement, QA/QC, data reporting, and the interpretation of bioassay results, all of which the Panel's phased implementation plan is intended to address. The draft Policy's currently proposed "phased monitoring" approach is likely to lead to the generation of data that cannot be reliably compared across sites or laboratories, and therefore cannot be rigorously assessed to inform future monitoring, due to the wide variety of unstandardized protocols currently in use. **We strongly believe the**	See responses to Comments 8.003, 8.018, 8.020, and 8.022.	10. CECs and Attachment A

No.	Comment	Response	Categories
	Panel's thoughtfully developed implementation approach is superior and should be reflected in the proposed Recycled Water Policy Amendment.		
31.013	As a part of its phased implementation of Bioanalytical Tool Monitoring, the Panel recommends that the State Board convene a Bioscreening Implementation Advisory Group (Section 7.4.3 of Final CEC Panel Report) to guide its recommended Phase I. According to the Panel, this group: *.."could consist of select Panel and SAG members, bioanalytical application experts, State Water Board staff and representatives from the commercial services industry who would ultimately be tasked to perform such measurements. The group would define goals for bioanalytical monitoring, specify protocols for sampling, extraction, measurement and data reporting, and provide guidance for interpretation of bioanalytical monitoring results, including QA/QC data. To maximize commonality and consistency of the guidance provided, the group would also interact with on-going and future efforts to develop, evaluate and apply bioanalytical tools for water quality screening, particularly those supported by the State Water Board and/or recycled water research organizations working with the State Water Board."*	See response to Comment 8.016 and 8.022.	10. CECs and Attachment A
31.014	The proposed Recycled Water Policy Amendment does not include a Bioscreening Implementation Advisory Group, nor does it acknowledge the underlying need for such a group; namely, the immaturity and associated lack of widely-accepted standard protocols for carrying out bioanalytical monitoring outside of a research environment.	See response to Comment 8.016 regarding the Bioanalytical Advisory Group, response to Comment 10.009 regarding the readiness of the bioanalytical screening tools, and response to Comment 6.006 allowing more time before monitoring is required.	10. CECs and Attachment A

No.	Comment	Response	Categories
31.015	Relatedly, we believe that the perspective of commercial laboratory service providers in California has yet to meaningfully inform the currently proposed implementation process. **Per the Panel's recommendation, the convening of such a group to assist with the initial implementation of the bioanalytical tool monitoring in recycled water should be included in the Recycled Water Policy Amendment.** Should State Board resources not be available to support the implementation of this group during the initial bioanalytical monitoring, numerous stakeholders within the water recycling community would likely be willing to support it to ensure the successful implementation of bioanalytical monitoring.	See response to Comment 8.016.	10. CECs and Attachment A
31.016	**4. Implied Widespread Standardization of Bioanalytical Monitoring Protocols** Implied throughout Attachment A is the idea that the two proposed bioanalytical monitoring tools, the Estrogen receptor-α (ER- α) and the Aryl hydrocarbon receptor (AhR), are sufficiently developed and standardized such that they can carried out on behalf of recycled water project proponents by multiple commercial laboratories using similar techniques, thereby generating reproducible and comparable data across recycled water facilities and laboratories in a manner analogous to targeted analytical chemistry methods. However, as stated previously, this draws a false equivalence and overstates the readiness of bioanalytical tools for regulatory-driven monitoring.	See responses to Comments 10.009 and 10.014.	10. CECs and Attachment A

No.	Comment	Response	Categories
31.017	As a part of a research effort and prior to the release of the proposed Recycled Water Policy Amendment, OCWD staff contacted the four commercial laboratories listed in the Final CEC Panel report (pg. 71, Section 7.2) that are purported to offer bioanalytical monitoring services for the ER- α and AhR assays: BDS, INDIGO Biosciences, IonTox, and Attagene, Inc. OCWD was seeking quotes to incorporate the ER- α and AhR assays into a recycled water research project. A summary of OCWD's first-hand experiences is presented below: • None of the four laboratories are located in California, but instead in Michigan (IonTox), Pennsylvania (INDIGO Biosciences), North Carolina (Attagene), and Amsterdam in The Netherlands (BDS). • Quotes were obtained from BDS and INDIGO Bionsciences; Attagene did not respond to multiple requests for a quote; IonTox eventually responded, but has not produced a quote to date. • The quotes obtained from BDS and INDIGO Biosciences were for substantially different protocols for carrying out the ER-α and AhR assays. o INDIGO Biosciences will not perform the required sample pre- extraction step, whereas BDS offers the option to perform the extraction. It remains unclear which extraction protocol each lab uses and/or requires. o INDIGO Biosciences recommended running both the ER-α and ER-β assays in both the Agonist and Antagonist modes for both tests; conversely, BDS recommended running the ER-α instead of the ER-β, and also recommended not doing Agonist and Antagonist Modes. o INDIGO Biosciences offered the AhR assay; BDS	Requesting quotes for a research project will likely result in different quotes compared to asking for quotes for the specific analyses required in the Amendment. State Water Board staff requested quotes to prepare the cost estimates in the Staff Report with SED and were told by each of the companies that they do analyze water samples or extracts of water samples. The stakeholder-driven Bioanalytical Advisory Group may be a resource to provide assistance in how to request a quote for the specific analyses that are required in Attachment A. Also, see response to Comment 6.006.	10. CECs and Attachment A

No.	Comment	Response	Categories
	offered the PAH CALUX and DR CALUX which were stated to be equivalent to the AhR. o BDS indicated it held the ISO/OECD TG455 certification for the ER-α assay, and a National Standard Test comparable to EPA Method 4435 for the AhR assay. INDIGO Biosciences indicated that the lab would o eventually be "ISO-certified" for both assays, but did not provide corresponding method numbers, only their laboratory tech manual.		
31.018	In summary, OCWD staff was presented with a number of different methodological protocols and variables when seeking quotes for the two required bioanalytical methods. Sorting through the menu of choices is very challenging for those without significant bioanalytical expertise, especially with the minimal guidance and QA/QC criteria provided in the proposed Recycled Water Policy Amendment or otherwise from the State Board. The four recommended commercial laboratories currently focus their services on the pharmaceutical and food industries; they appear unprepared to offer standardized bioanalytical services to analyze recycled water samples at this time. If this situation does not change significantly ahead of the implementation of required bioanalytical tool monitoring, then recycled water project proponents and the commercial laboratories will not have the requisite knowledge and standardized protocols to generate meaningful data with a reasonable level of effort.	See response to Comment 31.017.	10. CECs and Attachment A
31.019	**As such, we reiterate our strong support for the Final CEC Panel Report recommendation to convene the Bioscreening Implementation Advisory Group with the onset of required bioanalytical monitoring in recycled water.**	See response to Comment 8.003.	10. CECs and Attachment A

No.	Comment	Response	Categories
31.020	While standardization and interlaboratory studies involving bioanalytical tools are documented in the literature, these have typically been small scale-efforts involving a limited number of research laboratories. It is clear that the necessary level of standardization has not yet reached the wider environmental laboratory industry. In comparison, the availability of standardized targeted analytical chemistry monitoring for CECs from commercial and public utility laboratories is far more widespread. In California alone, at least four commercial laboratories (Eurofins, Test America, Weck Labs, and E.S. Babcock) and at least seven public agency labs (OCWD, Orange County Sanitation District, LA County Sanitation District, Santa Clara Valley Water District, City of San Diego, and the Metropolitan Water District of Southern California) are capable of analyzing recycled water samples for CECs using the established liquid chromatography tandem mass spectrometry (LC/MS-MS) technique. Notably, a crucially important "round-robin" interlaboratory comparison study was conducted ahead of the establishment of recycled water CEC monitoring requirements via the 2013 Recycled Water Policy. Water Research Foundation (WRF) Project 41674 featured the evaluation of analytical methods for CEC analysis via an interlaboratory comparison involving 25 different laboratories across three rounds of testing. The study resulted in the identification of method implementation and validation techniques, as well as specific recommendations for sample collection/preservation, analytical techniques, and QA/QC criteria that greatly improved the consistency of targeted CEC monitoring.	See response to Comment 6.006. The bioassays have undergone some interlaboratory comparisons (see Mehinto, A.C., Jia, A., Snyder, S.A., Jayasinghe, B.S., Denslow, N.D., Crago, J., Schlenk, D., Menzie, C., Westerheide, S.D., Leusch, F.D.L., Maruya, K.A. (2015) Interlaboratory comparison of *in vitro* bioassays for screening of endocrine active chemicals in recycled water. Water Res 83: 303-309.). In addition to this interlaboratory comparison, the data from the initial assessment monitoring phase can be used to refine the assessment framework and make any revisions before implementing the baseline assessment phase.	10. CECs and Attachment A

No.	Comment	Response	Categories
31.021	**We strongly recommend that a similarly structured, wide-ranging interlaboratory comparison study be conducted to help develop and refine the best procedures for conducting the required bioanalytical monitoring in recycled water.** Such an effort is worthy of both State Board and Water Research Foundation funding, and should be a higher priority than attempting to standardize" or "validate" additional bioanalytical tools via additional small-scale studies performed within research labs.	See response to Comment 6.006 and 31.020.	10. CECs and Attachment A
31.022	**5. Reporting Limits for Health-Based Indicator CECs** Table 1 in Appendix A of the proposed Recycled Water Policy Amendment lists the (minimum) reporting limits (RLs) for the Health-Based and Performance Indicator CECs proposed for required monitoring by potable reuse projects. However, it leaves out a very important stipulation included by the Panel in their Final Report regarding reporting limits (pg. 49, Section 5.4.2, 2nd paragraph): *"Method reporting limits (MRLs) were recommended at a **preferred ratio** of MTL [Monitoring Trigger Level] /MRL is [sic] 10. When this resulted in an MRL that cannot be practically achieved with existing methods (see also Chapter 6), the **Panel recommends setting a MTL/MRL** as high as possible, **but no less than 2."***	This concern has been addressed, see response to Comment 14.016.	10. CECs and Attachment A
31.023	For 1,4-dioxane, the newly added health-based indicator for potable reuse projects, the proposed RL is 0.1 µg/L. The only established analytical method that has been demonstrated to reliably achieve such a low RL is EPA Method 522, which was developed specifically for drinking water matrices and used for the USEPA UCMR 3 program. EPA Method 522 requires solid-phase extraction (SPE) followed by analysis via Gas Chromatography /Mass Spectrometry (GC/MS)	As the Panel indicated, "Method reporting limits (MRLs) were recommended at a preferred ratio of MTL [Monitoring Trigger Level] /MRL is 10. When this resulted in an MRL that cannot be practically achieved with existing methods (see also Chapter 6), the Panel recommends setting a MTL/MRL as high as possible, but no less than 2." Since the monitoring trigger level for 1,4-dioxane is 1 micrograms per liter, a reporting limit of 0.1 micrograms per liter meets	10. CECs and Attachment A

No.	Comment	Response	Categories
	with Selected Ion Monitoring (SIM). The required SPE step is time-consuming and labor-intensive, requiring large sample volumes and generating solvent waste. Additionally, EPA Method 522 has not been certified by the State Board's Environmental Laboratory Accreditation Program (ELAP). Given the very low RL requirement and the hierarchy for analytical method selection presented in Section 1.2.1 of Attachment A, the use of EPA Method 522 would effectively be mandated for 1,4-dioxane monitoring. However, there are other, well-established, and more efficient methods for 1,4- dioxane analysis which reliably achieve RLs of 0.15 – 0.5 µg/L using the purge and trap (P&T) technique for preconcentration before GC/MS analysis. The OCWD Advanced Water Quality Assurance Laboratory has successfully employed a reliable P&T + GC/MS method for 1,4-dioxane analysis for over 15 years. An overview of such methods can be found in a recent paper published in the Environmental Science & Technology journal5. The P&T technique allows for much more rapid sample processing than SPE and does not generate solvent waste. With the proposed 1,4-dioxane MTL of 1 µg/L, allowing RLs of 0.15 - 0.5 µg/L would be consistent with the Panel's recommended minimum MRL/MTL ratio of 2 and be comparable to the ratios of 5-6 proposed for the other health-based indicator CECs (NDMA and NMOR) included in Table 1.	the goal of having the reporting limit a 10 times lower than the monitoring trigger level. This recommendation is to increase certainty and accuracy of the detected concentration. See response to Comment 1.049 for a discussion of the method selection and approval process. See response to Comment 14.016 regarding the addition of a footnote to Table 7 allowing the regional water board to approve a higher reporting limit.	

No.	Comment	Response	Categories
31.024	As such, OCWD strongly recommends that the following footnote be added to the Reporting Limit column of Table 1 within Attachment A, consistent with the Panel's recommendations on RLs: ***Higher reporting limits may be acceptable if those indicated here cannot be practically or efficiently determined on recycled water sample matrices using existing methods, so long as the ratio between the reporting limit and the monitoring threshold limit (RL/MTL) is no less than 2.*** For consistency with the footnote, the following bolded text should also be inserted into the beginning of the 2nd paragraph of Section 1.2.1 of Attachment A: *"Analytical chemistry methods shall be selected in the subject to following hierarchical* ***order and the requirements found within Table 1:"***	See response to Comment 31.023.	10. CECs and Attachment A
31.025	In closing, we commend the State Board for reinitiating a science-based process to inform CEC monitoring requirements for recycled water by reconvening the expert Science Advisory Panel. However, we are concerned that a significant number of important Final CEC Panel Report recommendations have been either ignored or misinterpreted by State Board staff during the drafting of the proposed Recycled Water Policy Amendment. We urge the State Board to modify the current Recycle Water Policy Amendment to be more consistent with the Panel's Final Recommendations, especially with regard to the implementation of required bioanalytical monitoring. OCWD will continue to be a committed stakeholder on CEC and bioanalytical monitoring policy.	The Amendment has been revised to be more consistent with the Science Advisory Panel's recommendation in their Final Report. See responses to Comment 8.003 regarding the State Water Board's ability to make policy decisions based on it's review of the Panel's recommendations and Comments 8.016, 8.018, 8.020, 10.009, 10.014, 10.027, and 30.008 on the implementation of the bioanalytical monitoring requirements.	10. CECs and Attachment A
32	**Padre Dam Municipal Water District** **Commenter: Allen Carlisle**		

No.	Comment	Response	Categories
32.001	On behalf of Padre Dam Municipal Water District, I would like to thank you for the opportunity to provide comments on the Recycled Water Policy amendments to the State Water Resources Control Board. Padre Dam has been a leader in recycled water for over 60 years and is now implementing one of the first surface water augmentation projects in the State - our East County Advanced Water Purification Program which will create up to 30% of East San Diego County's drinking water supply. We would like to thank the Water Board staff for their efforts in updating California's Recycled Water Policy and wish to share our concerns with a few sections of the proposed policy changes.	This is the introductory statement to the comment letter, followed by Comments 32.002 to 32.007.	12. General Comment
32.002	**Bioassay Monitoring for Potable Reuse Projects** The draft Policy includes a new requirement to conduct two bioassays for potable reuse projects. Additionally, the draft Policy requires that a number of "response actions" be taken if the bioassays are above prescribed thresholds. We highly advise the Water Board to follow recommendations from the State Board's CEC Expert Panel that specifically state that regulatory "response actions" are premature and not advised until additional, data collection, research and pilot projects can be performed.	See responses to Comments 8.018 and 8.020.	10. CECs and Attachment A
32.003	We recommend the State Water Board follow the CEC Panel's recommendations of convening a Bioscreening Implementation Advisory Group, complete a standardization study, and implement the Bioassay testing using a phased approach.	See response to Comment 8.016 regarding the Bioanalytical Advisory Group, Comment 1.049 regarding validation and approval of analytical methods, and Comments 8.018 and 8.020 regarding the revisions that were made to the phased implementation.	10. CECs and Attachment A

No.	Comment	Response	Categories
32.004	Standardized methods of testing have not been established at this time and therefore the credibility of the results are called into question. Additionally, the availability of labs to complete this work is extremely limited – making it difficult for agencies to implement bioassay testing. We recommend that standardized testing methods be developed by the State through the Environmental Laboratory Accreditation Program (ELAP). The laboratories completing the work need to be credentialed to conduct the adopted ELAP methodology in order to ensure confidence in the lab results.	See responses to Comments 1.046, 1.049, and 6.006.	10. CECs and Attachment A
32.005	Additionally, statewide guidance for Quality Assurance Project Plans for bioanalytical monitoring using the bioassays is highly encouraged to help ensure a consistent process of sample collection amongst all agencies.	See responses to Comments 1.046, 1.049, 14.011, 14.012, and 14.022.	10. CECs and Attachment A
32.006	**Salt Nutrient Management Plan** Padre Dam supports the Regional Board's prioritization of Salt Nutrient Management Plan development. Padre Dam was among one of first agencies to develop and submit a SNMP to the Regional Board. However, we believe the inclusion of the Salt Nutrient Management Plans within the Recycled Water Policy is misplaced. Other sources of water including imported water, ag runoff, stormwater carrying nutrient loading from homeless encampments and environmental habitats can also contribute to salt nutrient loading into the groundwater basins. Consequently, Padre Dam's SNMP was limited in its scope, authority, and applicability. For this reason, we believe this item is better placed as part of the Sustainable Groundwater Management Act adopted in 2016. This would be a more comprehensive approach to managing the State's groundwater basins.	See response to Comment 1.027.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	We encourage the State Board to engage the Groundwater Sustainability agencies to ensure Salt Nutrient Management Plan objectives are incorporated into groundwater sustainability plans.		
32.007	**Annual Reporting** Padre Dam appreciates the Water Board staff's efforts in working closely with the recycled water community on annual recycled water reporting. We are supportive of the suggestions within this section of the policy as long as it is does not duplicate agencies reporting efforts. We would like to thank the Water Board staff for their efforts in updating California's Recycled Water Policy and ask that you consider our comments. We believe these suggestions will ensure a Recycled Water Policy that can be followed by agencies throughout the State.	See responses to Comments 1.037 and 11.003.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
33	**Raymond Basin Management Board** **Commenter: Anthony C. Zampiello**		
33.001	The Raymond Basin Management Board (RBMB) is the Court-appointed agency which manages the surface water and groundwater supplies of the Raymond Basin and its Relevant Watershed. In that capacity, RBMB was the lead agency to coordinate, prepare and submit the "Salt and Nutrient Management Plan" (SNMP) for the Raymond Basin which was required by the "Recycled Water Policy" adopted in 2009. The SNMP for the Raymond Basin was approved by the State Water Resources Control Board (SWRCB) on May 16, 2017. RBMB has had an opportunity to review the draft document entitled "Amendment to the Policy for Water Quality Control for Recycled Water" and provides the following comments.	This is an introductory statement to Comments 33.002 to 33.006.	12. General Comment
33.002	<u>General Comments</u> Although maintaining some of the original elements from the 2009 Recycled Water Policy, the draft 2018 Recycled Water Policy appears to be re-written in its entirely. This creates a challenge to clearly discern whether prior submittals (including the SNMP) will be affected under the amended Recycled Water Policy, if adopted. It would be beneficial to have a definitive statement in the draft Recycled Water Policy that an approved SNMP, or other SWRCB documents, is not subject to revision for at least 10 years following the date of adoption. This would be consistent with Section 6.1.3 requiring each regional board to evaluate the need for salt and nutrient planning.	See response to Comment 26.013.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
33.003	In addition, RBMB's downloaded copy of the draft 2018 Recycled Water Policy included numerous areas where " ... pursuant to 0... " is referenced, e.g. Sections 6.2.6, 7.1.2, and 8.2.2, among others. Although this appears to be a place-holder, it would be beneficial to enter the appropriate sections intended to be referenced and provide a time extension for public review so that the draft document may be reviewed in context.	Sections in the Amendment that included the language "pursuant to 0" have been changed accordingly to the appropriate reference within the Policy.	12. General Comment
33.004	Specific Comments 1. Section 5.2 states in part " ... determine that the proposed change will not injure any other legal user of the water involved, will not unreasonably affect instream users involving fish and wildlife, and is in the public interest." This section appears to be in conflict with itself. There likely are, or may be, circumstances when the legal user of the water already is authorized to make a discharge to a certain reach of a river/stream and is simply making a request to change the point of release. Failure to authorize a change petition may result in injury to the legal user in favor of continuing releases for fish and wildlife.	See response to Comment 27.004.	5. 1211 and WW Change Petitions
33.005	Furthermore, continued releases for fish and wildlife may adversely impact the stated goal in Section 3.1.1 to increase the use of recycled water to 2.5 million acre-feet per year by 2030. Consequently, it is suggested additional language be included to limit the quantity of recycled water to be set aside for fish and wildlife in favor of recycled water reuse, particularly where recycled water is essentially the only water in the stream/river channel, and effectively artificially creates habitat.	See response to Comment 27.004.	5. 1211 and WW Change Petitions
33.006	2. Section 6.2.11 states in part " ... the salt and nutrient management plans may address constituents other than salts and nutrients... "	See response to Comments 27.005 and 27.006.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	RBMB suggests this language be clarified to say "may, but is not required to, address... " 3. Section 6.2.6 RBMB requests the bullet "potential new data gaps" be removed.		
34	**Sacramento Regional County Sanitation District** **Commenter: Terrie Mitchell**		
34.001	Regional San is very supportive of statewide efforts to encourage and expand the use of recycled water as stated in California Water Code §13560. As a member of WateReuse, the California Association of Sanitation Agencies (CASA), and the Central Valley Clean Water Association (CVCWA), Regional San understands that State Water Board staff has been working with these various organizations on sections of this Draft Policy Amendment and we support their comments.	This is an introductory statement to Comments 34.003 to 34.054.	12. General Comment
34.002	While we appreciate the State Water Board's ongoing collaboration with the recycled water community on developing further refinements to the Policy, we feel there are a number of issues in the Draft Policy Amendment that need to be addressed before the final version is adopted later this year. In particular, the Draft Policy Amendment: • Adds a new goal beyond its original focus on increasing water recycled in the state; • Includes new, potentially burdensome monthly reporting requirements; • Is inconsistent with existing wastewater change petition regulations and Salt and Nutrient Management Plan (SNMP) requirements; and • Does not follow the recommendations of experts tasked by the State Water Board to develop monitoring	This is an introductory statement to Comments 34.003 to 34.054.	12. General Comment

No.	Comment	Response	Categories
	strategies for constituents of emerging concern (CECs). Regional San recommends that the State Water Board engage in additional stakeholder outreach and workshops to work through these issues prior to releasing a revised version of the Draft Policy Amendment.		
34.003	Regional San generally supports the comments submitted by WateReuse, CASA and CVCWA and offers the following additional comments. Detailed comments are included in Attachment A. Suggested language changes are indicated in redline ~~strikeout~~/underscore format.	This is an introductory statement to Comments 34.004 to 34.054. For response to comments submitted by WateReuse, CASA, and CVCWA see the relevant sections of this document.	12. General Comment
34.004	***I. The Recycled Water Policy should focus on the primary goal of increasing recycled water use, while protecting beneficial uses.*** The only stated goal in the current Recycled Water Policy is to "increase the use of recycled water from municipal wastewater sources." (at p.2). The Draft Policy Amendment proposes to add a new goal in Section 3.1.2 to "minimize the direct discharge of treated municipal wastewater to enclosed bays, estuaries and coastal lagoons, and ocean waters, except where necessary to maintain beneficial uses." While minimizing discharges to enclosed bays, estuaries, coastal lagoons and ocean waters is one way to reach the state's current recycled water goals, it should not be considered a goal in itself. The intent of the Recycled Water Policy should be to continue to maximize recycled water use and leave decisions about water quality impacts, such as minimizing discharges, to the Regional Boards. Elevating this concept to a Policy goal would send a message that recycling water in inland areas for agriculture, ecosystem enhancement and other purposes is a	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	lower priority than coastal recycling, and may provide a platform for the argument that water recycling should not occur unless wastewater would otherwise flow to a saline water body. If left in the Policy Amendment, this goal could easily become an unrealistic and unfunded mandate that fails to consider cost-effectiveness, feasibility of recycled water projects or local recycled water use needs. Regional San has studied a number of potential recycled water projects (including the aforementioned South County Ag Program) that would involve delivering our disinfected tertiary- treated effluent within our region. The challenge is that many options for water recycling are not cost effective or financially feasible at this time. If language regarding discharges to enclosed bays, estuaries, coastal lagoons, and ocean waters is left in the Draft Policy Amendment, *Regional San supports WateReuse and CASA's request that this language be moved to the "benefits" section of the Policy and be rewritten to encourage water recycling where wastewater is discharged to the ocean and bays.* Accompanying language on page 39 of the Draft Staff Report should be changed as well.		
34.005	We also support WateReuse and CASA's suggestion that the State Water Board consider expanding the "benefits" section to include other activities that would increase water recycling in California, such as encouraging recycled water use for agriculture and ecosystem enhancement activities in inland regions Further, we recommend that the State promote wintertime irrigation of recycled water, much as the State is encouraging the use of excess surface water flows for groundwater recharge for the replenishment of groundwater aquifers.	Section 2.3 was added to the Amendment to recognize the benefit of the use of recycled water as part of a strategy to diversify water supplies and adapt to climate change. Additionally, section 3.1.3 was added to the Amendment to include a statewide goal to maximize the use of recycled water in areas where groundwater supplies are in a state of overdraft, to the extent that downstream water rights, instream flow requirements, and public trust resources are protected. This statewide goal was added to emphasize the	2. Benefits of recycled water

No.	Comment	Response	Categories
		continued importance of recycled water use in inland regions.	
34.006	***II. Reporting requirements for municipal wastewater treatment plants should be coordinated with existing requirements to avoid burdensome duplicative administrative work.*** Regional San understands that State Water Board staff has worked closely with WateReuse on the annual tracking requirements outlined in Section 3.2.1.4.2 of the Draft Policy Amendment. We appreciate this close coordination with the recycled water community on this issue, but we are concerned with the monthly reporting requirements for municipal wastewater treatment plants included in Section 3.2.1. Specifically, influent and effluent flow are already reported by Regional San as part of the monthly Discharge Monitoring Reports (DMRs) that are prepared in accordance with the Sacramento Regional Wastewater Treatment Plant's NPDES permit and submitted electronically to the State Water Board through the California Integrated Water Quality System (CIWQS). The Draft Policy Amendment is unclear as to which electronic database this information would need to be submitted to in order to fulfill these new reporting requirements. Requiring this information to be reported in multiple databases on a monthly basis would be duplicative and would create an unnecessary administrative burden on our agency staff.	See responses to Comments 1.037 and 2.100.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	Regional San requests that State Water Board explicitly state that existing reporting requirements for municipal wastewater treatment plants would fulfill the reporting requirements proposed in this Draft Policy Amendment, and that any additional electronic reporting be coordinated through CIWQS.		
34.007	***III. Language in the Draft Recycled Water Policy Amendment related to wastewater change petitions must be consistent with existing regulations.*** Regional San supports the general approach proposed in Section 5 of the Draft Policy Amendment to clarify obligations of a proposed project proponent regarding wastewater change petitions under Water Code §1211. However, Regional San believes that proposed language in Section 5.3 of the Draft Policy Amendment should be modified to both clarify the role of the State Water Board in considering a wastewater Change Petition, as well as make Section 5.3 consistent with existing regulations governing the Change Petition process. Specifically, 23 California Code of Regulations §792(c) provides, in relevant part, "Any order approving a change under Articles 15, 16.5, or 17 shall include compliance with any applicable requirements of Division 13 (commencing with Section 21000) of the Public Resources Code." Appendix A, "CEQA Environmental Checklist Form" requires, among other things, the State Water Board to make "Mandatory Findings of Significance" regarding the following: "Does the project have impacts that are individually limited, but cumulatively considerable? ("Cumulatively	The regulation section referenced (23 CCR 792) is in reference to change petitions on pending water right applications, however the commenter is correct that the State Water Board must also comply with any applicable requirements of CEQA (division 13 (commencing with section 21000) of the Public Resources Code). Section 5.2 of the Amendment was revised to clarify that cumulative impacts would be considered in the context of CEQA, as the comment suggests, and also in relation to public trust resources.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
	considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects.) (See, Appendix A, §XVIII(b).) *In order to make Section 5.3 of the Draft Policy Amendment consistent with the State Water Board's* ***existing*** *regulations and analysis of cumulative impacts associated with a proposed Wastewater Change Petition, we request the following modifications to Section 5.3:* 5.3. Consistent with its responsibilities pursuant to CEQA, the State Water Board may consider potential "cumulatively considerable" (as defined in applicable State Board regulations) impacts to the environment and public trust resources caused by the proposed recycled water project and related projects that may reduce stream flows.		
34.008	***IV. Specific requirements for Salt and Nutrient Management Plans should be developed outside the Recycled Water Policy.*** Regional San has long been an active participant in the Central Valley Salinity Alternatives for Long- Term Sustainability (CV-SALTS) initiative for developing a basin-wide SNMP, which was recently adopted by the Central Valley Regional Water Quality Control Board (Regional Board) into the region's Basin Plans on May 31, 2018. We appreciate the State Water Board's references to CV- SALTS in the Draft Staff Report, and also appreciate the fact that on page 16 of the Draft Staff Report the State Water Board recognizes that "the appropriate way to address salt and nutrient issues is through the development of regional or subregional SNMPs, rather than through imposing	The commenter is in support of the development of SNMPs rather than imposing requirements solely on individual recycled water projects. This is also an introductory statement to Comments 34.009 and 34.010.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	requirements solely on individual recycled water projects."		
34.009	However, despite this recognition that SNMP development involves participation from all stakeholders in a region, the Draft Policy Amendment outlines specific detailed requirements and timelines for SNMPs. It is unclear if the requirements detailed in the Draft Policy Amendment and Draft Staff Report are intended to apply to all basins and sub-basins or just those where recycled water is being used. It is also unclear if existing basin plans that contain SNMP provisions will be exempt from all related Policy requirements. For instance, CV-SALTS and its associated basin plan has been through an extensive stakeholder process in the Central Valley and has been approved by the Central Valley Regional Water Board. Regional San recommends that the Policy clearly state an exemption from the SNMP requirements for basins and subbasins that already have approved SNMPs in place.	See response to Comment 26.013.	6. Salt and nutrient management plans
34.010	Additionally, it is unclear how the requirements outlined in the Draft Policy Amendment would relate, overlap, and coordinate with Sustainable Groundwater Management Act (SGMA) and Groundwater Sustainability Agencies (GSAs). With the level of detail included in the proposed policy Amendments, there's a potential for duplicative and contradictory requirements. For this reason, ***Regional San requests that prescriptive requirements for SNMPs be removed from the Recycled Water Policy*** as they would be best coordinated in a separate effort. If the requirements for SNMP remain in the Recycled Water Policy, Regional San recommends a number of detailed language	See responses to Comments 1.026 and 1.027.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	changes that we have included in Attachment A in order to prevent contradictory requirements.		
34.011	***V. The Policy needs to be flexible enough to allow continued coverage under existing Master Reclamation Permits.*** Regional San is supportive of the State Water Board's efforts to streamline the permitting process for recycled water projects and understand that, under the new Draft Policy Amendment, all permittees with engineering reports that were certified prior to 2000 would need to have their reports updated and reviewed by the State Water Board. We respectfully request that the policy more clearly state that agencies like Regional San be allowed to maintain coverage under our existing Master Reclamation permits upon review and approval of our Title 22 engineering reports, rather than being required to obtain coverage under the statewide general order.	See response to Comments 7.009 and 8.046.	11. Permit review and update
34.012	***VI. CEC monitoring requirements should be consistent with existing laboratory accreditation requirements and follow the Expert Panel's recommendations as outlined in the Monitoring Strategies for CECs in Recycled Water report.*** The Draft Policy Amendment proposes new CEC monitoring requirements for recycled water systems supplying treated wastewater for groundwater recharge or surface water augmentation projects. Regional San believes that CEC monitoring, as recommended by the Expert Panel, is not intended to be applied to surface spreading operations (including wintertime irrigation) where the recycled water will be percolating through an unsaturated zone and	The Policy is clear in that it only applies to groundwater recharge projects that meet the definition given in Water Code section 13531(c) (see definition of "groundwater recharge" in the Definitions section). If the surface spreading project is not permitted to meet California Code of Regulations, title 22 requirements, then the CEC monitoring requirements would not apply to the project.	10. CECs and Attachment A

No.	Comment	Response	Categories
	remaining organic materials will be degraded through Soil Aquifer Treatment (SAT). Therefore Regional San recommends that this be clarified in the policy.		
34.013	Regional San also understands that developing requirements for CEC monitoring is challenging as many test methods have not been approved and promulgated, so ensuring accuracy and standardization of laboratory protocols can be challenging. In light of this, we urge the State Water Board Use to use the Environmental Laboratory Technical Advisory Committee's (ELTAC's) framework to plan for Environmental Laboratory Accreditation Program (ELAP) accreditation of new analytical methods. This framework will likely increase the number of laboratories that are able to conduct CEC monitoring by communicating the need and appropriate methods for such testing to the laboratory community. It will also help ensure consistency and oversight of CEC testing labs. Labs should be ELAP accredited before the State Water Board begins implementing response actions to CEC detections.	See response to Comment 1.046.	10. CECs and Attachment A
34.014	The Draft Policy Amendment also includes proposed requirements for testing with bioanalytical screening tools. The proposed requirements are based on a recommendation issued by the Science Advisory Panel in their April 2018 report entitled *Monitoring Strategies for Constituents of Emerging Concern (CECs) in Recycled Water* (CEC Report). The Science Advisory Panel prepared the CEC Report in response to direction from the State Water Board. Regional San supports the use of a Science Advisory Panel to inform monitoring requirements in the Draft Recycled Water Policy. However, our concern with this particular monitoring requirement is that the Draft Policy Amendment ignores a number of the Science Advisory Panel's recommendations in regards to appropriate use of the bioanalytical screening tools. In the CEC	See responses to Comment 10.009 regarding the readiness and reliability of the ER-α and AhR. See responses to Comments 8.018, 8.020, 10.014, and 10.027, regarding the updated phased monitoring approach and assessment and the inclusion of the response actions. See responses to Comments 1.046 and 1.049 regarding the validation and approval of analytical methods and lab accreditation.	10. CECs and Attachment A

No.	Comment	Response	Categories
	Report, the Science Advisory Panel cautions that these methods are not sufficiently reliable for regulatory actions, specifically noting "a significant amount of work remains before a useful collection of bioanalytical tools is ready for regulatory compliance application." (at p. 67). They go on to clearly advise against interpreting a bioanalytical response as a monitoring trigger level (MTL) that would require a recycled water producer to conduct various response actions, cautioning that "requiring response actions during the initial data collection phase is premature and, thus not appropriate, until such methods are fully validated and certified by the appropriate entities [e.g. the State Water Board's Environmental Lab Accreditation Program (ELAP)], and that the interpretive framework outlined in 7.3 has matured and has been subject to a critical evaluation by water quality experts, State Water Board personnel and stakeholder representatives" (at p. 81). Rather, the Science Advisory Panel recommends that only screening-level data are collected with these methods for the next 3 to 5 years, stating "these assays are now sufficiently standardized and robust for screening level data collection and assessment over the next 3 to 5 years." (at p. xii). Despite this, Attachment A of the Draft Policy Amendment proposes an MTL for the bioanalytical methods with associated potential response actions to be taken when bioanalytical screening tool results are below or above these response thresholds (Table 10, at p. A-21). Regional San is particularly concerned with the MTLs because the additional actions outlined in the Draft Policy Amendment "may include, but are not limited to, targeted and/or non-targeted analytical chemistry monitoring, increased frequency of bioassay monitoring, toxicological studies, engineering removal studies, modification of facility operation,		

No.	Comment	Response	Categories
	implementation of a source identification program, and monitoring at additional locations" (at p. A-21). Any of these proposed response actions has the potential to be extremely costly to our ratepayers and potentially prevent Regional San from delivering recycled water for beneficial uses. Given that the proposed test methods are not fully developed, do not have standardized methods, and require additional research to establish health-based bioscreening thresholds, *Regional San urges the State Water Board to eliminate the language regarding response actions to bioscreening thresholds and follow the Science Advisory Panel's proposed phased approach to utilizing bioanalytical screening tools as outlined in the CEC Report.* Further technical detail on our concerns with the bioanalytical screening tool is included in Appendix A.		
34.015	In conclusion, we would like to reiterate our support for the comments provided by WateReuse, CASA and CVCWA, and appreciate the State Water Board's consideration of our additional comments on the Draft Recycled Water Policy Amendment.	This comment is a conclusory statement to Comments 34.0121 to 34.0014; no change is requested.	12. General Comment
34.016	**Section 2. Benefits of recycled water** Section 2.1 of the Draft Staff Report summarizes the results of the State Water Board and California Department of Water Resources (DWR) 2015 Municipal Wastewater Recycling Survey, noting that 3 percent of recycled water produced in 2015 was used for natural systems restoration, wetlands, and wildlife habitat (at p.4). However, there is little further mention of ecosystem benefits elsewhere in the Draft Policy Amendment and Staff Report, nor is environmental habitat and wetland augmentation discussed. Regional San encourages the State Water Board to explicitly mention environmental habitats and ecosystem	See response to Comment 34.005. In response to this comment, section 3.2.3 of the Amendment was modified to include "natural system augmentation" as a category of discharge, to account for this use of water to augment natural systems, such as wetlands, wildlife habitats and duck clubs.	2. Benefits of recycled water

No.	Comment	Response	Categories
	benefits in Section 2 of the Draft Policy Amendment as one of the many of benefits of recycled water.		
34.017	**Section 4. State agency roles** As mentioned above, one of the benefits of recycled water use is environmental enhancement. Regional San recommends that the State Water Board amend Section 4 of the Draft Policy to include the title of the regulation or policy where requirements related to environmental enhancement can be found. Additionally, since recycled water and CECs are addressed in various forums and documents, we recommend referencing related efforts for completeness of this Policy and for clarity. A reference should be added to Section 4 for other state efforts related to recycled water, CECs, and recommended or required monitoring. One forum and related report that should be mentioned is published by the Ecosystems Panel for CECs in aquatic ecosystems entitled *Monitoring Strategies for Chemicals of Emerging Concern (CECs) in California's Aquatic Ecosystems.* Additional applicable references related to recycled water and CECs that can be identified should be added to Section 4	The requested change was not made. Section 4 enumerates state agency roles with respect to recycled water. As the CEC efforts described by the commenter relate to ambient waters in California rather than recycled water, it is not appropriate to include reference in section 4 to the 2012 aquatic ecosystems panel or its report, "Monitoring Strategies for Chemicals of Emerging Concern (CECs) in California's Aquatic Ecosystems" in the Amendment. However, the Staff Report with SED was modified to include discussion of broader CEC efforts being undertaken by the Water Boards, including a proposal to reconvene the 2012 aquatic ecosystems panel. See section 4.14.6 of the Staff Report with SED for more information.	4. State agency roles
34.018	***Section 6.1. Introduction*** Section 6.1.1 of the Draft Policy Amendment lists the conditions that cause salts and nutrients to exceed or threaten to exceed water quality objectives. We recommend the addition of industrial sources to make the list more complete as follows: "These conditions can be caused by naturally-occurring sources of salinity, discharges of industrial, agricultural, domestic, and municipal wastewater and residual solids (including on-site wastewater treatment systems)."	Section 6.1.1 of the Amendment has been revised to include the requested addition of industrial discharges.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
34.019	Section 6.1.1 also lists water uses that may impact salt and nutrient loading. We recommend the addition of Water use and diversions to make the list more complete as follows: "In addition, irrigation using imported water, surface water, groundwater, or recycled water, and indirect potable reuse for groundwater recharge (groundwater recharge) can contribute to increased salt and nutrient loading. Water use and water diversions may also contribute to salt and nutrient concentrations."	In response to the comment, section 6.1.1 of the Amendment was modified to include reference to diverted water, as follows: "In addition, irrigation using imported water, diverted water, surface water, groundwater, or recycled water, and indirect potable reuse for groundwater recharge (groundwater recharge) can contribute to increased salt and nutrient loading."	6. Salt and nutrient management plans
34.020	***Section 6.2. Development and adoption of salt and nutrient management plans*** Section 6.2 of the Draft Policy Amendment lists several requirements and components for salt and nutrient management plans. However, given the complexity of flows, soil conditions, stratification, and the potential variation of water quality in surface and groundwater within each basin and sub- basin, and the complexity of developing the management plans, we recommend adding a sentence that allows for flexibility and changes to the plans. For instance, in some locations it might not be possible to immediately identify a complete monitoring strategy as described in section 6.2.4.1 if water quality conditions vary or are unknown for certain portions of the basin. A sentence should be added to section 6.2.1 that states: "Salt and nutrient management plans are complex plans that may require changes, iterations, and amendment to allow incorporation of all items described in this section."	The Amendment encourages updates to salt and nutrient management plans to incorporate changing or unknown water quality conditions in a basin. The requested change was not made; however, sections 6.2.6 and 6.2.7 of the Amendment are included to ensure salt and nutrient management plans are updated on an ongoing basis to address changing water quality conditions in a basin and other factors, as outlined in 6.2.6.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
34.021	Section 6.2.1 of the Draft Policy Amendment states "for basins identified pursuant to 6.1.3, the State Water Board encourages local water and wastewater entities, together with local salt and nutrient contributing stakeholders, to continue locally driven and controlled, collaborative processes open to all stakeholders that will result in the development of salt and nutrient management plans for groundwater basins and the management of salts and nutrients on a basin-wide basis, including participation by the regional water board." It's unclear in this sentence what is meant by "local water and wastewater entities". We recommend clarifying this phrase by using terms such as "local water suppliers and wastewater treatment agencies," or some other terminology or phrase that is more descriptive and common to similar State Water Board policies.	Section 6.2.1 of the Amendment was revised in response to this comment to change "local water and wastewater entities" to "local water suppliers, wastewater treatment agencies, and recycled water producers."	6. Salt and nutrient management plans
34.022	Section 10.2.4 of the Draft Policy Amendment states that "each report shall recommend actions that the State of California should take to improve our understanding of CECs and, as may be appropriate, to protect human health and the environment." Although the Science Advisory Panel may suggest recommended actions, these recommended actions should not include or result in enforcement actions on agencies.	See responses to Comments 8.003, 8.018, and 8.020.	10. CECs and Attachment A
34.023	Section 10.2.5.1: Commercial laboratories may not be able to conduct the recommended analytical methods. Therefore this section needs to be modified as follows: "The appropriate constituents to be monitored in recycled water, including readily available, standardized analytical methods and reporting limits."	Section 10.2.5.1 of the Amendment refers to the Science Advisory Panel research program topics and was not revised in response to this comment. See response to comment 1.049 regarding availability of analytical methods, and method validation and approval. See response to Comment 14.016 regarding the ability for the regional water board to approve alternative reporting limits.	10. CECs and Attachment A

No.	Comment	Response	Categories
34.024	Section 10.2.5.3 of the Draft Policy Amendment notes "any change to the above constituents based on level of treatment and uses specified in Title 22 and for reservoir water augmentation" This requirement should be more specific as to what types of changes need to be reported and what would be considered a change.	This provision indicates that the Panel will recommend different constituents for the different types of uses or treatment levels specified in California Code of Regulations, title 22. For example, in the Amendment the required performance indicator CECs differ between surface application and subsurface application groundwater recharge projects. This section does not pertain to a recycled water treatment facility's requirements to report to the regional water board when changes are made to the facility.	10. CECs and Attachment A
34.025	Section 10.2.5.5: If the Science Advisory Panel is going to recommend a concentration of a CEC that will trigger enhanced monitoring, this subsection should clarify that the report should also include the rationale and methodology for selecting each CEC concentration trigger.	All past Panel reports do include the rationale and methodology for selecting the monitoring trigger levels and this requirement does not need to be specified in the Amendment. The 2018 Panel's discussion of the monitoring trigger levels is in chapter 4.3 of their report. Section 4.14.2 of the Staff Report with SED includes additional discussion for the monitoring trigger levels for AhR.	10. CECs and Attachment A
34.026	Section 10.2.5.6: The requirement for "recommendations regarding antibiotic resistant bacteria and antibiotic resistance genes" is too general. The Draft Policy Amendment should also state what the purpose and expected outcome for the recommendations will be.	Because antibiotic resistant bacteria and antibiotic resistance genes is still a burgeoning field of study in recycled water and there is a lack of standardized methods for monitoring antibiotic resistant bacteria and antibiotic resistance genes, this topic is purposefully general to allow the Panel flexibility on this topic.	10. CECs and Attachment A
34.027	The State Water Board should evaluate CEC monitoring laboratories and maintain a list of acceptable laboratories. It is inefficient for recycled water producers to evaluate the Quality Management Systems (QMS) of laboratories, particularly producers who lack the expertise necessary to determine if a laboratory's QMS meets the requirements of Section 1.1. The State Water Board should follow the Science Advisory Panel's recommendation to form an expert panel, as the expert panel could help with this task.	See responses to Comments 1.046, 6.006, and 8.003, 8.018, and 8.020.	10. CECs and Attachment A
34.028	Additionally, Section 1.1.1 should be removed from the policy and (ELAP) requirements should be incorporated by reference (i.e. 22 CCR 64802.10). It is	See response to Comment 1.046.	10. CECs and Attachment A

No.	Comment	Response	Categories
	inappropriate to require the QMS specified in Section 1.1.1 before ELAP adopts the new NELAC Institute (TNI) standards into regulation. It is our understanding that ELAP plans to adopt TNI into regulation in early 2019 with a 3-year implementation period.		
34.029	Section 1.2.1. Selection of Analytical Chemistry Methods ELAP accreditation for a CEC method should be required within 6 months when such accreditation becomes available during the monitoring period. ELAP accreditation should not be limited to the "time monitoring is required to begin."	See response to comment 1.046.	10. CECs and Attachment A
34.030	Additionally, the State Water Board should maintain a list of acceptable methods for CEC monitoring to ensure that results are comparable between recycled water producers and meet the reporting limits in Table 1. Providing a list would also reduce the time State Water Board staff would spend consulting to determine appropriate methods. It is unclear who at the State Water Board has the authority to consult on appropriate methods. To reflect this, Section 1.2.1 should be modified as follows: Analytical chemistry methods shall be selected by the recycled water producer from the State Water Board's list of approved methods. The State Water Board shall select methods in the following hierarchical order: (1) ~~Use~~ USEPA-approved methods~~, if available. If more than a single USEPA-approved method is available, consult with the State Water Board to determine the appropriate USEPA-approved method. If these methods are unavailable;~~ (2) ~~Use~~ Standard Methods~~, if available. If more than a single Standard Method is available, consult with the State Water Board to determine the appropriate~~	Section 1.2.1 of the May 9, 2018 version of the Amendment was deleted and replaced with section 1. See responses to Comments 1.046 and 1.049 regarding the selection of analytical methods and Comments 14.011, 14.012, 14.022 regarding guidance on the methods.	10. CECs and Attachment A

No.	Comment	Response	Categories
	~~Standard Method. If these methods are unavailable~~ (3) ~~Use m~~Methods required by the State Water Board for state-only drinking water standards or for identifying chemicals having notification levels. ~~If these methods are unavailable;~~ (4) ~~Use a m~~Methods from the scientific literature (e.g., peer-reviewed journals). ~~If more than one method is available, consult with State Water Board to determine an appropriate method.~~		
34.031	Section 1.2.2. Analytical chemistry data submission The State Water Board should evaluate the method detection limit (MDL) studies and reporting limit (RL) verification data and maintain a list of laboratories capable of meeting CEC reporting limit requirements. Recycled water producers should not be responsible for evaluating the acceptability of laboratory MDL studies or RL verification data.	Recycled water producers are responsible for submitting quality assurance data required in the QAPP but not responsible for evaluating the acceptability of laboratory MDL studies or RL verification data. See response to Comment 8.030.	10. CECs and Attachment A
34.032	The State Water Board should follow the Science Advisory Panel's recommendation to form a Bioanalytical Advisory Group, as this group of experts could help with this task.	See response to Comments 8.016.	10. CECs and Attachment A
34.033	Section 1.3. Bioanalytical Screening Tools As with the Chemical Analysis, for the Bioanalytical Screening Tools ELAP accreditation for a CEC method should be required within 6 months when such accreditation becomes available during the monitoring period.	See response to Comment 1.046.	10. CECs and Attachment A
34.034	Additionally, the State Water Board should maintain a list of acceptable methods for CEC monitoring to ensure that results are comparable between recycled water producers and meet the reporting limits in Table 1. Providing a list would also reduce the time State Water Board staff would spend consulting to determine appropriate methods. It is unclear who at the State Water Board has the authority to consult on appropriate methods. To reflect this, Section 1.2.1	Section 1.2.1 of the May 9, 2018 version of the Amendment was deleted and replaced with section 1. See responses to Comments 1.046 and 1.049 regarding the selection of analytical methods and Comments 14.011, 14.012, 14.022 regarding guidance on the methods.	10. CECs and Attachment A

No.	Comment	Response	Categories
	should be modified as follows: Bioanalytical screening tool methods shall be selected by the recycled water producer from the State Water Board's list of approved methods. The State Water Board shall select U.S. EPA methods, if available. ~~in the following hierarchical order: (1) Use U.S. EPA methods, if available. If more than a single U.S. EPA-approved method is available, consult with the State Water Board to determine the appropriate U.S. EPA-approved method. If these methods are unavailable; (2) Consult with the State Water Board to determine an appropriate method.~~		
34.035	Section 1.3.2. Bioanalytical screening tool data submission The State Water Board should evaluate the method detection limit (MDL) studies and reporting limit (RL) verification data and maintain a list of laboratories capable of meeting CEC reporting limit requirements. Recycled water producers should not be responsible for evaluating the acceptability of laboratory MDL studies or RL verification data. The State Water Board should follow the Science Advisory Panel's recommendation to form an expert panel, as the expert panel could help with this task.	See responses to Comments 8.030.	10. CECs and Attachment A
34.036	***Section 2.2. Surrogates for CECs*** ELAP accredited laboratories should be used for surrogate monitoring when testing is not conducted by the recycled water producer.	While the use of a laboratory that had been accredited for approved methods for the surrogates is encouraged, it may not be feasible or practical. Many surrogates are measured using on-line or hand-held instruments, which would not be eligible for ELAP accreditation. However, instrument calibration and use would be specified in the quality assurance project plan to ensure that data of a known quality is obtained for surrogates.	10. CECs and Attachment A

No.	Comment	Response	Categories
34.037	***Section 4.1. Initial Assessment Monitoring Phase*** Analytical procedures need to be validated to ensure comparability of analytical results before response actions are warranted. According to the SCCWRP presentation "Current Status of Bioanalytical Methods" given on 6/11/2018, comparability studies are still needed for the different cell lines and laboratories. In addition, method validation and standardization for sample collection (i.e. grab or composite sample, holding time of sample and extract), extraction procedure, quality control samples (i.e. types, frequency, acceptance criteria), and analysis procedure are crucial steps for ensuring comparability of data for recycled water.	See responses to Comments 1.046, 1.049, 8.003, 8.018, and 8.020.	10. CECs and Attachment A
34.038	***Section 5. Evaluation of Health-Based CEC Results*** Both Table 8 on page A-19 and Table 10 on page A-21 include direction to "resample immediately" as a potential response action. This requirement needs to be stated in a way that is more specific and clear (i.e. within 14 days of receiving the laboratory report).	Table 8 and Table 10 of Attachment A have been revised to specify that resampling should occur within 72 hours of notification of the result.	10. CECs and Attachment A
34.039	Table 10 should be modified to remove MTLs and response actions in light of the following concerns with the bioanalytical screening tools: • There are a limited number of laboratories performing the tests. Of the four labs that currently perform the test, three appear to be on the East Coast and one is in the Netherlands. ThermoFisher/LifeTech is a sales company that does not list the laboratories that carry their product. • Can four laboratories meet the demand for the test and maintain timely throughput? Will the State Water Board encourage one of their labs to start performing the test?	See responses to Comments 6.006.	10. CECs and Attachment A

No.	Comment	Response	Categories
34.040	• What is the acceptable holding time between sample collection and analysis? Most of the referenced chemical methods (EPA 1613, etc.) is 7 days from collection to extraction. If samples are held longer than 7 days, will the results still be accurate?	Acceptable hold times between sample collection and analysis are typically specific to the analytical method and would be specified in the quality assurance project plan required in section 1 of Attachment A.	10. CECs and Attachment A
34.041	• There is a lack of promulgated or regimented procedure for bioassay screening for the Estrogen Receptor (ER). Each lab can perform the extraction and analysis differently which would give different results. • There is no certifying regulatory agency determining if the laboratory is performing the test correctly. Will the laboratories be required to be ELAP certified before monitoring and testing is required?	See responses to Comments 1.046, 1.049, and 10.009.	10. CECs and Attachment A
34.042	• The 2016 TNI requirement or the QC manual is primarily a documentation of the method and laboratory practices that has no impact on data quality. This will not make data comparable between laboratories.	See response to Comments 1.046, 1.049. Maintaining and following a quality assurance project plan (QAPP) is one piece of ensuring laboratories generate data of known, consistent, and documented quality.	10. CECs and Attachment A
34.043	• The ER test is listed as in pilot evaluation by the CEC Scientific Advisory panel. Is it appropriate to require the use of this test at this stage?	The Panel recommended the estrogen receptor-alpha *in vitro* bioassay for monitoring because they concluded it was appropriate to begin data collection. See response to Comment 10.009 regarding the readiness and reliability of the bioassays. See response to Comments 6.006, 8.018, and 8.020 regarding changes that were made to the timeline for the phased implementation for the bioassays.	10. CECs and Attachment A
34.044	• Is the background response level of 25% lower adequate to attenuate baseline interference for quantitation?	The recycled water producer will need to implement the quality assurance/quality control provisions in the QAPP to ensure that quantitation is accurate and distinguishable from the baseline.	10. CECs and Attachment A

No.	Comment	Response	Categories
34.045	• The SCCWRP presentation "Current Status of Bioanalytical Methods" given on 6/11/2018 states that methods were modified to include "selected fortification (e.g. QA/QC matrix spike samples only)". Does this mean that method blanks and laboratory control samples were not extracted and analyzed to evaluate contamination (false positive rates) and method accuracy in a clean matrix? Were MDL studies performed, including the extraction step, to evaluate the validity of reporting limits?	The selected fortification samples (spiking a field sample with a known concentration of a known chemical to assess extraction recovery) are included in addition to laboratory and field blanks. MDL studies were performed as part of the following study: Escher et al. 2014. Development of Bioanalytical Techniques to Assess the Potential Human Health Impacts of Recycled Water. WateReuse Research Foundation. WRRF-10-07.	10. CECs and Attachment A
34.046	• The SCCWRP presentation states that SOPs are available. Are these SOPs available to the regulated community and ELAP accredited laboratories? Is method validation information publicly available?	The SOPs developed by SCCWRP are published in the following published article: Mehinto et al. 2016. Screening for Endocrine Activity in Water Using Commercially-available in vitro Transactivation Bioassays. Journal of Visualized Experiments, Vol. 118, p. 1-7, e54725, doi:10.3791/54725. The SOPs are available to the regulated community and laboratories. An interlaboratory comparison study is also available: Mehinto et al. 2015. Interlaboratory comparison of in vitro bioassays for screening of endocrine active chemicals in recycled water. Water Research, Vol 83, p. 303-309, http://dx.doi.org/10.1016/j.watres.2015.06.050.	10. CECs and Attachment A
34.047	• Would it be more cost and time effective to only use chemical methods for screening at this time?	Requiring the use of bioanalytical screening tools will lead to further standardization and of these tools, making them more cost and time effective. In addition, several recycled water producers that will be required to monitor with bioanalytical screening tools are supportive of beginning to use these tools and further standardizing the methods because they see them as useful tools for identifying potentially unknown CECs in recycled water.	10. CECs and Attachment A

No.	Comment	Response	Categories
34.048	**Section 3.4.1.4. Antidegradation Analysis and Assimilative Capacity** Page 17, last paragraph: This paragraph should be modified to reflect the adoption of the CV- SALTS Basin Plan amendment by the Central Valley Water Board on May 31, 2018. That BPA was supported by a certified CEQA analysis.	Section 3.4.1.4 of the Staff Report with SED was revised to reflect the requested change.	6. Salt and nutrient management plans
34.049	**Section 4.8.3. Data Assessment and Periodic Updates to SNMPs** On page 55 the Draft Staff Report notes that "The Policy states that stakeholders shall provide monitoring data collected from SNMPs every three years, but does not include any language regarding the type or frequency of assessment to be done with that data. The Amendment changes the frequency of data reporting from every three years to annually to facilitate regional water board review of monitoring data." Related Draft Policy Amendment Section 6.2.4.1.3 states "The monitoring plan shall identify those stakeholders responsible for conducting, compiling, and reporting the monitoring data. The data shall be electronically reported **annually** to a database in a format identified by the State Water Board (e.g., GeoTracker)." The benefits to changing reporting from every 3 years to annually seems onerous and without corresponding benefit related to evaluating long term changes to water quality. It's also unclear how the change to annual reporting will facilitate Regional Water Board review. It's likely that the change to require annual reporting will be costly without a corresponding benefit since water conditions typically change slowly over time.	See response to Comments 2.016 and 2.098. Sections 6.1.3 and 6.2.6 of the Amendment require the regional water boards to evaluate available data every five years to assess basin conditions and determine where salts and nutrients are a threat to water quality and therefore need salt and nutrient management planning in the long-term, as well as to evaluate water quality trends in basins with SNMPs. Section 6.2.4.1.3 of the Amendment was modified to clarify that annual data generated as a result of a salt and nutrient management plan must be electronically reported to a Groundwater Ambient Monitoring and Assessment (GAMA) information system. Centrally locating SNMP data will aid the regional water boards in conducting these periodic assessments. Evaluating SNMPs at a five-year frequency will require the regional water boards to have more granular data than would be available if the three-year reporting of SNMP data were maintained; it is therefore appropriate to change the three-year frequency of reporting to annual.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
34.050	Additionally, the Draft Staff Report states on page 55 that "whether or not updates to SNMPs are needed is left to the discretion of Regional Water Boards in consultation with stakeholders." However, on page 56, first paragraph, the Draft Staff Report states that an SNMP would need to be revised if trends are significantly different from those predicted in the SNMP, implying that the State Water Board would require the update. This inconsistency should be resolved.	Section 6.2.7 of the Amendment requires the regional water boards, in consultation with stakeholders, to determine whether updates to an SNMP are warranted as a result of the periodic evaluations conducted by the regional water board pursuant to 6.2.6. Section 4.8.3 of the Staff Report with SED was revised to clarify the regional water board authority for requiring SNMPs to be updated.	6. Salt and nutrient management plans
34.051	**Section 4.8.4. SNMPs and the Policy** Page 56 of the Draft Staff Report should be revised as follows to include activities that might impact salinity: "More often, it is other entities or activities such as agriculture, industry, wastewater treatment plant operations, water diversions and water use, or water agencies importing high- salinity water that result in significant contributions of salts and/or nutrients to a groundwater basin."	See response to Comment 34.019. The commenter's requested change was included in the Amendment.	6. Salt and nutrient management plans
34.052	**Section 4.9.1. Priority Pollutant Monitoring Requirements** Page 60, second paragraph: The Draft Staff Report states that priority pollutant monitoring will not be required for landscape irrigation projects, since runoff from such projects is prohibited. We agree with and support this finding.	The commenter supports Staff Report with SED language relating to removing priority pollutant monitoring for landscape irrigation projects: no change is requested.	7. Permitting for Non-potable

No.	Comment	Response	Categories
34.053	**Section 4.10.1. Antidegradation Analysis for Non-Potable Recycled Water Projects** Page 63, second paragraph: The Draft Staff Report states that the provision to allow landscape irrigation projects to be permitted if it uses less than 10 percent of available assimilative capacity (or 20 percent in combination with other projects) will be eliminated in basins where SNMPs are being developed. The rationale for this change is unclear. Additionally, it is unclear how compliance with antidegradation requirements would be satisfied for such projects.	State Water Board staff has expanded discussion in the Staff Report with SED of the rationale for eliminating the provision to allow landscape irrigation projects that meet the streamlined permitting criteria and use less than 10 percent of the available assimilative capacity (or 20 percent for multiple projects) to be permitted without further antidegradation analysis. The use of recycled water for landscape irrigation does not typically represent a significant component of the salt and nutrient balance in a groundwater basin. Therefore, allocation of 10 percent of the assimilative capacity of a basin to one landscape irrigation project may not be justified. Furthermore, landscape irrigation projects may be permitted under Order WQ 2016-0068-DDW, Water Reclamation Requirements for Recycled Water Use. Projects permitted under Order WQ 2016-0068-DDW need only demonstrate compliance with the conditions of the Order to satisfy compliance with the Antidegradation Policy.	7. Permitting for Non-potable
34.054	**Section 4.14.1. Targeted Analysis for CECs** Page 70, last paragraph: It is stated that analytical methods for targeted CEC analysis are included in Table 4-3 if a laboratory has demonstrated that it can be reliably detected with the listed method. Is documentation available to demonstrate that reliable detection at levels of concern (i.e. below MTLs) has been achieved? Is data available from multiple labs? Regional San strongly recommends that this be seriously looked at and evaluated.	Section 10.2.5.1 of the Amendment requires the Panel to address "The appropriate constituents to me monitored in recycled water, including analytical methods and reporting limits." The Panel's risk-assessment framework includes a screen that there are available analytical methods for analyzing the constituents. Each of the CEC Monitoring Parameters has an analytical method that can be used to reliable quantify the constituents. Response to Comment 1.049 described method selection, validation, and approval. Chapter 6 of the 2018 Science Advisory Panel's report describes in detail analytical methods for the targeted CECs and potential issues (e.g., extraction issues).	10. CECs and Attachment A

No.	Comment	Response	Categories
35	**San Diego County Water Authority, Robert Yamada** **Helix Water District**, Brian Olney **Padre Dam Municipal Water District**, Allen Carlisle **Olivenhain Municipal Water District**, Kimberly Thomer **City of Oceanside**, Cari Dale **Santa Fe Irrigation District**, Cor Shaffer **Otay Water District**, Mark Watton **City of Escondido**, Christopher McKinney		
35.001	We appreciate efforts by State Water Board staff during development of this amendment to meet with water agencies and stakeholders through various meetings and workshops. We support many of the proposed changes to the Policy, which we believe will further the goal of increasing recycled water use in California. We also offer the following recommendations on areas that we think should be changed in the final Amendment to the Policy.	This is the introductory statement to the comment letter, followed by Comments 35.002 to 35.017.	12. General Comment
35.002	<u>Remove goal to minimize wastewater discharges:</u> The draft Amendment includes a new goal to minimize direct discharge of treated municipal wastewater to enclosed bays, estuaries and coastal lagoons, and ocean waters, except where necessary to maintain beneficial uses. While the use of recycled water will reduce discharge of treated municipal wastewater, we recommend that this should be identified as a benefit of using recycled water rather than as a goal. We support recommendations made by WateReuse California that the Policy only include the goal of encouraging the safe use of recycled water.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
35.003	Streamline reporting: We support the intent of the Amendment that reporting on municipal wastewater treatment plants and recycled water production and use should not be duplicative between the State Water Board and the Regional Water Board. Currently, municipal wastewater treatment plant operators provide reporting through the state's California Integrated Water Quality System (CIWQS). We ask the State Water Board to also consider that using a single database for reporting would improve efficiency by recycled water agencies that are also wastewater agencies. We encourage the State Water Board to work with stakeholders when setting up the data entry parameters to ensure that the database structure can adequately reflect the complex relationships among agencies for recycled water production and distribution.	See response to Comment 1.037.	3. Goals, mandates, and reporting requirements
35.004	Salt and nutrient management plans: We support the additional flexibility provided in the draft Amendment for Regional Water Boards to evaluate individual basins to determine the need for **SNMPs**, and to prioritize their development. Following the 2009 Policy Amendment, the Water Authority and its member agencies worked with the San Diego Water Board to develop guidelines establishing a standardized approach and framework for developing **SNMPs** within the San Diego Region. These guidelines were endorsed by way of a San Diego Water Board resolution in November 2010, and have been implemented in the region.	The commenter is in support of section 6.1.3 of the Amendment; no change is requested.	12. General Comment
35.005	Development of **SNMPs** should be coordinated with Groundwater Sustainability Plans under the Sustainable Groundwater Management Act where appropriate. We support the functional equivalency approach identified in section 6.2.1.4 related to development of **SNMPs**.	The commenter supports the Amendment language relating to the functional equivalent approach to SNMPs if a groundwater management plan was developed pursuant to SGMA; no change is requested.	12. General Comment

No.	Comment	Response	Categories
35.006	Under section 6.2.4.1, it is not clear who is responsible for developing and implementing a basin monitoring plan. Responsibility for monitoring should not be placed solely on recycled water agencies. They should also not be held responsible for ensuring that monitoring occurs by other stakeholders, nor do they have this authority. The Amendment should be clear that all stakeholders in the basin will be held equally responsible for monitoring.	The SNMP program in the Policy is primarily a collaborative process, as opposed to an enforcement-driven process, as reaffirmed in State Water Board Resolution 2016-0061 (A)(2), which states that the State Water Board supports and encourages "Local water and wastewater entities, together with local salt and nutrient contributing stakeholders, to continue locally driven and controlled, collaborative processes open to all stakeholders that will result in the development of salt and nutrient management plans for groundwater basins in California, including compliance with CEQA and participation by Regional Water Board staff." Within this context, the participation of individual stakeholder groups is dependent on the willingness of the individuals within the stakeholder group. In certain cases, a regional water board may require participation in an SNMP as a condition of a permit. However, assigning individual monitoring requirements to stakeholders within SNMP groups is not within the scope of the Amendment.	6. Salt and nutrient management plans
35.007	<u>Permitting recycled water projects under master reclamation permits:</u> In the San Diego region, most recycled water agencies have master reclamation permits that provide coverage for a combination of recycled water treatment, use, and disposal. Since the statewide general permit for recycled water does not provide this level of coverage, agencies with master reclamation permits in San Diego that might enroll under the state permit would still require an additional permit. Coverage under multiple permits requires more resources and is less streamlined than coverage under a single master permit. While we understand from the staff report that the intent of the Amendment is to provide flexibility in allowing agencies to continue to be covered under regional master reclamation permits, we think this should be made clearer in the amendment, and provide suggested language to section 7.3.2.2.2 in	See responses to Comments 7.009 and 8.046. The State Water Board may consider including treatment requirements in a future update to Order WQ 2016-0068-DDW.	11. Permit review and update

No.	Comment	Response	Categories
	an attachment to this letter. If the long-term goal is for all recycled water agencies to be covered by a single general permit, we recommend that treatment be added to the statewide permit during a future permit update.		
35.008	CEC bioassay monitoring for potable reuse projects: In its 2018 Final Report: Monitoring Strategies for Constituents of Emerging Concern in Recycled Water, the Science Advisory Panel recommends that bioanalytical monitoring for potable reuse projects be conducted over a three to five-year period with no required response actions during this time due to the current state of knowledge and experience in this field related to recycled water. The Panel also recommends convening over this same period a bioscreening implementation advisory group to help develop protocols and guide utilities through the initial data collection period. We ask that the amendment be revised to reflect these recommendations by the Panel.	See responses to Comments 8.003, 8.018, 8.020 regarding updates to the phased monitoring approach and Comment 8.016 regarding the Bioanalytical Advisory Group.	10. CECs and Attachment A
35.009	Requiring response actions by water utilities is premature before bioassay methods are standardized and health implications are better understood. The staff report provides no scientific basis for this requirement. The Water Board is currently funding a study with the Water Research Foundation that involves standardization and validation of bioanalytical tools for recycled water. Following completion of this study, standardized methods for utilizing bioassays should be developed by the state through the Environmental Laboratory Accreditation Program (ELAP). In addition, the State Water Board should lead an effort with the bioscreening implementation advisory group to develop statewide guidance for Quality Assurance Project Plans for bioanalytical monitoring using the recommended bioassays. Finally, there is limited understanding about the relationship between exceedances of bioassay monitoring thresholds and	See responses to Comments 8.003, 8.018, 8.020 regarding the phased monitoring approach and timing of response actions. See response to Comments 1.046 and 1.049 regarding the selection, validation, and approval of analytical methods and ELAP accreditation. See response to Comment 8.016 regarding the regarding the Bioanalytical Advisory Group. See section 4.14.2 of the Staff Report with SED for a discussion of the monitoring trigger levels for ER-α and AhR.	10. CECs and Attachment A

No.	Comment	Response	Categories
	impacts on human health. The state's Office of Environmental Health Hazard Assessment should be involved in evaluating the links between bioanalytical monitoring of CECs in drinking water and human health risks.		
35.010	We recommend that the staff report clarify that costs for bioanalytical monitoring presented in Table 4-6 of the staff report do not include additional costs that will be required by utilities for personnel training and time to conduct bioassay monitoring.	Section 4.14.2 of the Staff Report with SED was updated to include the following text to address this concern, " "In addition to the costs mentioned above, there may be additional costs associated with personnel training and the time to conduct the monitoring and implement the quality assurance measures. However, these costs will vary depending on the current capabilities of the laboratory. There are existing laboratories available that are currently trained to conduct the bioassays and the costs of grabbing an additional sample are minimal. Whereas if a laboratory has no experience in conducting these analyses, then the costs for establishing the lab and training personnel may be more substantial. Consequently, cost estimates for these factors were not included in Table 4-6."	10. CECs and Attachment A
35.011	Provide additional clarity to Amendment language We recommend simplifying language in the draft Amendment to improve clarity, particularly related to SNMPs, the antidegradation policy, and reporting requirements for producers and municipal wastewater treatment plants.	The Amendment language was reviewed for clarity. Partly in response to this comment, section 7 of the Amendment was restructured to clarify antidegradation requirements and remove streamlined permitting requirements that were challenging for some commenters to follow. In addition, Attachment A of the Amendment was restructured to clarify and simplify the CEC monitoring requirements to more closely align with language used by permit writers.	12. General Comments
35.012	6.1.3. Add additional factors to be considered in development of SNMPs, which are identified in the staff report: • Important hydrologic factors, such as regional aquitards, depth to water, natural formations, and other region-specific factors • Existing groundwater quality	In response to this comment, section 6.1.3 of the Amendment was revised to include consideration of "Hydrogeologic factors, such as regional aquitards, depth to water, and other basin- or subbasin-specific factors." The addition of "existing groundwater quality" was not accepted because this is already included in the list of factors, as "magnitude of and trends in the concentrations of salts and nutrients in groundwater." The addition of "consideration of GAMA or CASGEM basin prioritization" was not included	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	• Consideration of GAMA or CASGEM basin prioritization	because it is not appropriate to require every regional water board to consider the CASGEM and GAMA basin prioritizations for each basin evaluation. CASGEM and GAMA basin prioritizations may be used by the regional water boards to aid in their basin assessments, as described in section 4.8.1 of the Staff Report with SED.	
35.013	6.2.1.2. Revise as shown in red underline and strikeout: The State Water Board recognizes that in some parts of the state ~~because~~ stormwater ~~is typically~~ may be lower in nutrients and salts and can be used to augment local water supplies...	Stormwater in California is typically lower in salt and nutrient content than underlying groundwater. "Typically" is an appropriate characterization.	6. Salt and nutrient management plans
35.014	6.2.4.1.3. Add the following language: Where applicable, the Regional Water Board will assist by convening stakeholders and ensuring that all other dischargers in the relevant basin are participating in the monitoring program.	The SNMP program within the Policy is primarily a collaborative program as opposed to an enforcement-driven program. Section 6.2.4.1.3 of the Amendment was revised to say: "Where applicable, the regional water board will assist by encouraging other dischargers in the basin or subbasin to participate in the monitoring program."	6. Salt and nutrient management plans
35.015	7.3.2.2.2. Revise as shown in redline: The regional water board shall make a finding of unusual circumstances in a site-specific permit pursuant to 7.3.3, resolution or other order based on substantial evidence in the record if the regional water board determines that unusual circumstances apply, after public notice and hearing. Unusual circumstances may include coverage under a regional master recycling permit.	See response to Comments 4.012 and 2.051. Section 7.3.2 for streamlined permitting of non-potable recycled water projects, including section 7.3.2.2.2, was removed from the Amendment. See response to Comment 8.046 for an explanation of a recycled water project's ability to continue using a master recycling permit.	7. Permitting for Non-potable
35.016	Attachment A. Tables 5 and 6: Remove footnote 1 under monitoring frequency for bioanalytical screening tools.	The footnote is necessary because the frequency of monitoring in the baseline and standard operating monitoring phases is intended to be based on the results of	10. CECs and Attachment A

No.	Comment	Response	Categories
		the prior monitoring phase and may be more frequent than what is stated in Table 5 and Table 6.	
35.017	Attachment A. Delete Tables 8 and 10, and section 5.3 Evaluation of Bioanalytical Screening Tool Results.	Table 8 is from the Policy and is necessary to evaluate potentially high concentrations of health-based CECs in recycled water for potable applications. Table 10 is an analogous table, also necessary to evaluate bioanalytical monitoring results in the baseline and standard operating monitoring phases. Section 5.3 of Attachment A is the narrative explanation, aiding in results evaluation by describing bioanalytical result thresholds and response actions. See response to Comments 8.018, 8.020, 10.014, 10.027 and 26.018 regarding the phased monitoring approach and the response actions.	10. CECs and Attachment A
36	**County Sanitation Districts of Los Angeles County** **Commenter: Ann Heil**		
36.001	The Sanitation Districts of Los Angeles County (Sanitation Districts) serve the wastewater collection and treatment needs of approximately 5.6 million residents in the Los Angeles Basin, Santa Clarita Valley, and Antelope Valley. The Sanitation Districts have a long history of water recycling, encompassing over fifty years. Currently, almost 900 individual sites served by approximately three dozen water purveyors use over 100,000 acre-feet per year (AFY) of tertiary treated recycled water for non-potable applications such as urban landscape irrigation, agriculture, industrial process water, and potable uses, such as groundwater replenishment. Since the inception of our program in 1962, the Districts have delivered over one trillion gallons of recycled water for reuse. The Sanitation Districts support the State Water Resources Control Board's (State Water Board's) efforts to amend the existing Recycled Water Policy to	This is an introductory statement to Comments 36.002 to 36.109; no change is requested.	12. General Comment

No.	Comment	Response	Categories
	update and clarify its provisions, in so far as those changes will enhance, rather than unnecessarily impede, future recycled water project development and currently implemented projects. Expanding the use of recycled water will only increase in importance over time, as the cycle of drought years will inevitably continue, along with an ongoing increase in the state's population.		
36.002	There are several aspects of the draft Policy for Water Quality Control for Recycled Water (Proposed Policy) that we believe will support the Policy's goal of expanded recycled water usage, and the Sanitation Districts support these provisions. Examples of these provisions include removing an unenforceable mandate on the total amount of recycled water usage in California, making it clear that groundwater monitoring is not required for projects eligible for streamlined permitting, adding language stating that the regional boards are to use their authority to the fullest extent possible to streamline permitting of recycled water projects, removing the requirement for all irrigation projects to have an operations and maintenance plan (instead allowing regional board discretion on this issue), allowing groundwater recharge projects to comply with the Antidegradation Policy by demonstrating that their project is consistent with an adopted salt and nutrient management plan (SNMP), removal of required management practices associated with controlling and limiting incidental runoff, and removal of required priority pollutant monitoring for non-potable reuse projects. We are also supportive of most of the proposed new recycled water reporting requirements, in order to provide better information that will allow the State Water Board to track the quantity and usage of recycled water throughout the State on an ongoing basis.	This is the introductory statement to the comment letter, followed by Comments 36.003 to 36.109. The commenter supports several sections of the Amendment; no change is requested.	12. General Comment

No.	Comment	Response	Categories
36.003	However, the Sanitation Districts also have a number of concerns about the proposed changes to the Recycled Water Policy, as detailed below. Our primary concerns relate to the shift in overall focus of the policy, addition of a new goal to minimize ocean discharges of treated municipal water, new provisions relating to wastewater change petitions, and new requirements for use of bioanalytical screening tools. Our concerns are detailed below, along with suggested changes to address them.	This is the introductory statement to the comment letter, followed by Comments 36.004 to 36.109.	12. General Comment
36.004	**<u>Purpose of the Policy</u>** The original Recycled Water Policy was adopted in 2009 with the purpose of increasing the use of recycled water from municipal wastewater sources. It appears that the Proposed Policy is heading in a different direction, and its purpose would no longer be to increase usage of recycled water. Rather, the focus seems to be on increasing the safety of recycled water and to provide direction to various parties on permitting of recycled water projects. This change in the purpose of the policy is not warranted. It continues to be essential to expand recycled water usage, as the concerns outlined in the Preamble of the original Recycled Water Policy are still valid (e.g., the Bay Delta ecosystem, climate change, population growth, droughts, etc.). Additionally, it is unclear why there needs to be an increased focus on increasing the safety of recycled water in California, in light of the long history of safe recycled water usage in the state, stretching back over at least 50 years.	The State Water Board adopts policies for water quality control using its authority under Water Code section 13142. The title of the Policy was changed to "Water Qualtiy Control Policy for Recycled Water" from the 2009 version, "Policy for Water Quality Control for Recycled Water," although the Policy is still referenced as the "Recycled Water Policy" as stated in section 1.1 of the Amendment. The purpose of the Policy remains to encourage the use of recycled water as stated in section 3.1 of the Amendment. However, the increase in recycled water must be done in a manner that protects public health and the environment, as it is the State Water Board's mission to "preserve, enhance, and restore the quality of California's water resources and drinking water for the protection of the environment, public health, and all beneficial uses." The purpose and goals stated within the Amendment are aligned with this mission. Additionally, the Policy itself cannot increase the use of recycled water, rather it provides guidelines, goals, and a streamlined permitting framework to encourage the increased use of recycled water.	1. Purpose

No.	Comment	Response	Categories
36.005	This change in focus is reflected in the proposed title for the policy, which would be amended from "Recycled Water Policy" to "Policy for Water Quality Control for Recycled Water." ***We request that the original title be retained, to reflect that the purpose of the Policy is to broadly facilitate use of recycled water and not just to control its quality. We also request that the stated purpose of the Policy be reinstated to the purpose in the original Recycled Water Policy, i.e. "The purpose of this Policy is to increase the use of recycled water from municipal wastewater sources…".***	See response to Comment 36.004.	1. Purpose
36.006	**<u>Statewide Consistency</u>** Section 1.5 of the Proposed Policy addresses the State Water Board's intent regarding statewide consistency in recycled water permitting. The language in the Proposed Policy is weaker regarding statewide consistency than the language in the original Recycled Water Policy. The original Recycled Water Policy stated intent was to "maximize" consistency, while the proposed language stated intent is to only "promote" consistency. ***The Sanitation Districts believe that statewide consistency is essential to promoting increased use of recycled water, and requests that language to "maximize" consistency continue to be used in the Policy.***	In response to the comment, section 1.5 in the Amendment was changed from the "intent to promote consistency in the permitting of recycled water projects" to the "intent to maximize consistency in the permitting of recycled water projects," to be consistent with the provisions stated in section 11 in the Amendment (i.e., "Maximizing consistency in permitting recycled water projects").	1. Purpose
36.007	**<u>Definitions</u>** The Proposed Policy includes definitions for enclosed bays, estuaries and coastal lagoons, and ocean waters. These terms have already been defined by the State Water Board in documents such as the Policy for Implementation of Toxic Standards for Inland Surface Water, Enclosed Bays, and Estuaries of California. ***To avoid confusion or inconsistencies, it is recommended that definitions for these terms not***	These definitions are consistent with the Water Quality Control Plan for Ocean Waters of California and Policy for Implementation of Toxic Standards for Inland Surface Water, Enclosed Bays, and Estuaries of California. The definition section was added for terms found through the Amendment to improve clarity and readability, while also remaining consistent with other State Water Board policies. The definitions are intended to only apply to their use within this Amendment and may not be appropriate in other contexts.	14. Definitions

No.	Comment	Response	Categories
	be included in the Proposed Policy, but rather a reference be made to where definitions can be found.		
36.008	**<u>Removal of Mandates and Certain Goals</u>** ***The Sanitation Districts support the removal of storm water and water conservation goals from the Recycled Water Policy.*** This change helps to clarify the purpose of the Recycled Water Policy by eliminating issues that are only loosely associated with recycled water. Also, the Sanitation Districts support the elimination of the existing state-wide mandates for recycled water use, since many recycled water producers, such as the Sanitation Districts, do not provide direct water service, and many water purveyors do not produce their own independent source of recycled water. Setting mandates on either the producers or the purveyors individually are, indeed, unworkable and unenforceable. The Sanitation Districts and many other agencies have had significant success with the use of recycled water in their service areas by establishing partnerships with both wholesale and retail water purveyors to develop recycled water distribution systems, as noted above.	The commenter supports Amendment language relating to removing storm water and water conservation goals and mandates for recycled water use; no change is requested.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
36.009	**<u>Inclusion of Unattainable Goals</u>** Section 3.1.1 proposes highly aspirational goals for recycled water usage, calling for an increase from 714,000 AFY to 1.5 million AFY by 2020 and 2.5 million AFY by 2030. This would mean a doubling of recycled water use in the next two years, which is clearly impossible. It took over 50 years to develop infrastructure for the current amount of water being recycled. Additionally, these lofty goals do not reflect the amount of municipal wastewater currently available (or reasonably expected to be available in the future) as a feedstock to produce recycled water.	See response to Comment 2.042.	3. Goals, mandates, and reporting requirements
36.010	For 2030, if one assumes a per capita indoor usage of 50 gallons per person per day and a population of 44 million (California Department of Finance projection), the total amount of wastewater generated is expected to be less than the proposed 2.5 million AFY goal. Even if were possible to recycle all available water within the next 12 years, allowance would still need to be provided for minimum stream flows and brine losses due to advanced treatment of water, as well as other factors such as storage availability to account for diurnal and seasonal variation, cost of treatment and distribution, customer availability, duplication of service issues, and capacity for expansion.	See response to Comment 2.042.	3. Goals, mandates, and reporting requirements
36.011	The Staff Report acknowledges that the goals are unrealistic, but states that data are not available to develop more realistic goals. However, as noted in Section 4.3 of the Proposed Policy, the Department of Water Resources is required by law to establish statewide recycled water targets and has already done so. ***In the absence of data necessary to set a realistic goal, the Proposed Policy should use the***	See response to Comment 2.042. See section 4.5.1 of the Staff Report with SED for additional information.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	Department of Water Resources established targets.		
36.012	**<u>Inclusion of Goal Regarding Minimization of Ocean Discharges</u>** Section 3.1.2 of the Proposed Policy includes a goal to "Minimize the direct discharge of treated municipal wastewater to enclosed bays, estuaries and coastal lagoons, and ocean waters, except where necessary to maintain beneficial uses. For the purpose of this goal, treated municipal wastewater does not include brine discharges from recycled water facilities or desalination facilities." This stated goal is highly problematic, especially when read in conjunction with the language in Section 3.2 (indicating that the State Water Board plans to evaluate progress toward this goal and "establish mandates as necessary") and in conjunction with Section 3.4 (requesting that the State Lands Commission, Coastal Commission, and other state agencies use their authorities to the "fullest extent possible" in achieving this goal). The State Lands and Coastal Commissions have broad authorities that could lead to mandatory requirements to recycle from ocean discharging facilities.	See response to Comment 1.002. Section 3.4 of the Amendment was revised to specify that the State Water Board requests other agencies use their respective authorities to promote and streamline permitting and funding of recycled water projects to aid in making progress towards the goals in section 3.1 of the Amendment. Changes were made to section 3.2 of the Amendment to remove the phrase "or establish mandates" in response to comments received. See response to Comment 29.004 for more information.	3. Goals, mandates, and reporting requirements
36.013	There are a number of constraints that make it difficult to fully recycle all the water treated at certain ocean discharging treatment plants, including the Sanitation Districts' Joint Water Pollution Control Plant (JWPCP). ***For the reasons detailed below, Section 3.1.2 of the Proposed Policy should be removed in its entirety, and Section 3.2 should be revised to remove the phrase "or establish mandates". Instead, a new Section 2.3 should be added to the "Benefits" section preceding the "Goals" section. It would read, "Expanding recycled water usage will allow for increased use of water that would otherwise be discharged to saline water bodies." Additionally,***	See responses to Comments 1.002 and 36.012.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	the water boards should collect information on the extent of water recycling in California, as proposed under Section 3.2, and then, after full consideration of all of the factors that can affect the development of recycled water projects, revisit the numeric recycled water goals in a future policy revision. We believe that this is a preferable way to address this issue.		
36.014	*Water Quality Constraints* The Sanitation Districts operate one wastewater treatment facility with an ocean discharge, JWPCP, located in Carson, CA. This facility currently serves about three million people and treats approximately 265 MGD of wastewater. The JWPCP receives industrial wastewaters that are high in salts which, historically, have been too expensive to treat to a quality suitable for use as recycled water. Instead of focusing on reuse from JWPCP, the Sanitation Districts have had a strategy of building water reclamation plants (WRPs) to treat more suburban wastewater, and thereby produce recycled water closer to the intended users. This has resulted in today's current infrastructure that includes ten water reclamation facilities serving recycled water to nearly 900 sites. As mentioned above, historically the saltiest water from the region has been sent to JWPCP, whose ocean outfall serves an important role in managing salinity in the region. This salinity management function extends to the Inland Empire which, in addition to a brine line that connects to the Orange County Sanitation District, has a dedicated sewer to send salty wastewater to JWPCP. This sewer is needed to remove salt from the Inland Empire and protect their groundwater basins. Therefore, it is not possible to use the effluent	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	produced at JWPCP, even for non-potable uses such as landscape irrigation, without the installation of costly advanced treatment.		
36.015	Another concern for water quality is brine discharge. While the proposed goal would allow for brine discharges from recycled water facilities to continue, reusing all water except the brine would mean that brine would be discharged to the ocean without dilution from other treated wastewater. This could present potential issues with meeting receiving water quality objectives, particularly in instances where an outfall to an ocean, enclosed bay, or estuary has a low dilution credit, such as in the South San Francisco Bay. Consideration must also be given to meeting sediment quality objectives and to preserving communities of marine life near the outfalls.	See response to Comment 1.002. The narrative goal does not call for the elimination of discharges of treated wastewater to saline water bodies. Coastal dischargers may consider the ability to meet dilution credits when determining whether to recycle treated wastewater rather than discharging it directly to saline waters. The State Water Board supports and encourages the investment and development of alternate treatment methods of waste streams to meet sediment and water quality objectives and to preserve marine life communities.	3. Goals, mandates, and reporting requirements
36.016	*Market Constraints* Another constraint on the use of recycled water generated by JWPCP relates to markets available for the recycled water.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
36.017	JWPCP is in the proximity of other wastewater treatment plants, including the Hyperion Treatment Plant and the Terminal Island Treatment Plant, both of which are owned and operated by the City of Los Angeles. The West Basin Municipal Water District (West Basin MWD), a large regional water wholesaler, has a robust water recycling program and purveys recycled water supplied by the City of Los Angeles, primarily from the Hyperion Treatment Plant. To date, demand has not been large enough for West Basin MWD to need any recycled water produced by JWPCP. Together, in the South Bay region of Los Angeles County, the two largest wastewater treatment plants west of the Mississippi (JWPCP and Hyperion) treat nearly 500 MGD (or over 560,000 AFY) of wastewater. There are not enough irrigation and	See response to Comment 1.002. Assembly Bill 574 and Water Code section 13561.2 require the State Water Board to adopt uniform water recycling criteria for direct potable reuse through raw water augmentation on or before December 31, 2023. There are many available, or soon to be available, methods of production, application, and beneficial uses of recycled water that could be considered before directly discharging treated wastewater to enclosed bays, estuaries and coastal lagoons, and ocean waters.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	industrial sites within a reasonable vicinity of JWPCP and Hyperion to reuse even a significant portion of the available recycled water. Additionally, for non-potable recycled water uses, such as for irrigation, demand is largely seasonal and drops significantly during the wetter, cooler months, which would necessitate enormous storage facilities if all of the recycled water was to be used, due to the amount of water under consideration. Constructing such storage could be an insurmountable challenge in a built-out urban area. Due to the lack of sufficient nearby demand, the most promising approach for new large-scale water recycling at JWPCP is potable reuse, which can efficiently use larger quantities of water and integrate the new supply into the existing potable water infrastructure. While new infrastructure would be required, potable reuse projects generally avoid the need for dual plumbing and expensive retrofits of buildings and water distribution systems. Groundwater recharge has a long history in California, dating back to the Montebello Forebay Groundwater Recharge Project that began in the early 1960s. To date, there are no regulations to allow raw water augmentation or treated water augmentation reuse projects in California. Therefore, at the current time, large-scale potable reuse depends on the availability of replenishment capacity in groundwater basins and the availability of suitable surface water reservoirs. Such projects are only able to proceed in those areas where groundwater recharge and/or surface water augmentation is found to be feasible, and in some cases lengthy transmission lines are necessary to convey recycled water to the groundwater basin or reservoir.		

No.	Comment	Response	Categories
36.018	Institutional Relationships & Legal Authority One of the challenges for many wastewater agencies that want to (or must) recycle their effluent is that they do not have authority to purvey water. Even those that do have this authority may not be able to do so without permission from the local water agency or city (see, for instance, California Health & Safety Code Section 4767, which applies to districts formed under the County Sanitation District Act). Thus, if the State Water Board's proposed goal develops into a mandate for recycling all of certain types of effluent, some wastewater agencies will be in the untenable position of having to do something they do not have the legal authority to accomplish. Even if they have the legal authority, if they proceed to develop a recycled water system or project and serve the recycled water without the involvement and consent of the local water supplier, they risk having to pay damages under the Service Duplication Act (see California Public Utilities Code Sec. 1501 et seq.). This could add substantial additional cost and time to develop the recycled water project. Another legal challenge for the development of recycled water supplies within the context of indirect potable reuse is the need for other groundwater basin or reservoir managers to allow waterbodies under their purview to be used for such projects. If they do not agree with the projects, then the wastewater agency would have no ability to use those basins or reservoirs, and would be forced to search for more distant locations to do the projects. This could make the projects far more expensive and challenging. It is preferable to develop recycled water projects and systems through collaboration and partnerships between wastewater and water agencies, and that is what typically happens. In some instances one of the agencies may not wish or be able to cooperate, which	See responses to Comments 1.002 and 36.017. The establishment of mandates for recycled water use is not within the scope of this Amendment.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	can lead to hurdles or even impasse. Starting on a path to develop mandates will change the dynamics of developing these partnerships and joint projects. The relationships and roles of various agencies that have responsibilities for water resources are very complex, and that complexity can create barriers in being able to move recycled water projects forward.		
36.019	*Good Planning is the Best Path Forward* We believe that a one-size-fits-all approach (e.g., pushing for 100% recycling of all waters discharged to ocean waters, enclosed bays, estuaries, and coastal lagoons) is not efficient or feasible using practical technologies, nor is it a good way to make decisions about the best investments in recycled water supply projects.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
36.020	California currently requires urban water suppliers to prepare Urban Water Management Plans, and wastewater agencies provide information about the availability of recycled water supplies to water agencies when they update these plans (see California Water Code Section 10633). Similarly, agricultural water suppliers are required to prepare Agricultural Water Management Plans. Many water agencies also prepare Recycled Water Master Plans, or similar documents, to plan their recycled water systems. Urging that one single source of water – recycled water – be prioritized ahead of all other options will lead to inefficient development of water supplies from an economic perspective, and may undermine water conservation initiatives or the development or use of other local water supply options that may make more sense, depending on the local area. For instance, along the North Coast there may be no need to use recycled water for a local water supply, or it may be technically infeasible to make it available. And, as previously discussed, in the Los Angeles region the location of two very large wastewater plants in close proximity to each other may make it economically infeasible to make use of all of the recycled water potentially available.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
36.021	*Costs* A combination of factors – large volumes of recycled water, the need for advanced treatment for most forms of reuse using JWPCP effluent, lack of sufficient demand for non-potable uses of recycled water, and lack of sufficient storage for enormous quantities of recycled water – indicates that the only way to approach a program of reuse for all or even a sizeable portion of JWPCP effluent is to focus on potable reuse. We believe this would likely be the case for many of California's ocean dischargers.	See responses to Comments 1.002 and 1.008. The State Water Board is funding research with The Water Research Foundation to examine the feasibility of expanding recycled water use statewide, through research titled, "Identifying the Amount of Wastewater that is Available and Feasible to Recycle in California (Ag-PD-02)." In addition, increasing the use of recycled water is one of the directives under Action Item 2 of the Governor's	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	It seems likely that the statewide costs to recycle all water discharged to the ocean, enclosed bays, estuaries, and coastal lagoons (including the costs for state regulatory agencies) would be many billions of dollars, and it would be informative for a statewide feasibility analysis and cost estimate to be developed. It is important to remember that as more recycled water projects are done, the remaining projects are the more costly ones to do, because the "low hanging fruit," meaning the easier, more cost-effective projects, have already been pursued. Currently state funding for water recycling (through Proposition 1 and the Clean Water Act State Revolving Loan Fund) is insufficient to meet demand. How will local agencies and their ratepayers afford the infrastructure to recycle all of this water without a massive infusion of state funds?	California Water Action Plan. In addition to available Proposition 1 and Clean Water State Revolving Fund moneys, California voters approved Proposition 68 in June 2018, which provides 100 million dollars for recycled water projects. More information on Proposition 68 can be found on the Legislative Analyst's Office website: https://lao.ca.gov/BallotAnalysis/Proposition?number=68&year=2018	
36.022	*Public Acceptance* Underlying all of the issues outlined above is the need for the public and the business community to support the use of recycled water on a large scale. While there has been good support of the use of recycled water for non-potable uses in most (though not all) areas, building support for potable use of recycled water is still in its early stages. The media's tendency to play up controversy by calling potable reuse recycled water projects "toilet-to-tap" and other such monikers has increased public opposition to some potable reuse projects, and caused them to stall or be set aside. Business community support is also crucial, since costs could increase substantially and businesses can be large customers. As for general public acceptance, a statewide (or at least coastal region) sustained educational campaign to promote the use of recycled water as a new water supply in California would be	Public outreach and education campaigns may be more effective when uniquely tailored to each recycled water project, since the barriers and audience will vary between communities. State Water Board staff will follow up with the commenter to further discuss their proposal. No change is requested to the Amendment.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	helpful. Key to such an effort is the credibility of the source of the campaign.		
36.023	An entity such as the State Water Board or the Department of Water Resources should be tapped to lead such an effort, in consultation with stakeholder groups such as the Water Education Foundation, WateReuse California, the California Association of Sanitation Agencies, and the Association of California Water Agencies.	See response to Comment 36.022.	3. Goals, mandates, and reporting requirements
36.024	**<u>Reporting Requirements</u>** The Sanitation Districts support the State Water Board's efforts to develop more usable and accessible data regarding recycled water usage. To comply with its recycled water permit requirements, the Sanitation Districts have always provided information on recycled water usage, both to individual sites and through discrete distribution systems. Developing a process to compile information on recycled water usage statewide will greatly enhance the ability of the State Water Board to understand and communicate the status of recycled water usage across the state.	This comment is an introductory statement to comments 36.025 to 36.029.	3. Goals, mandates, and reporting requirements
36.025	However, we have some concerns about the reporting requirements as they are currently written. First, we feel that it is critical to avoid duplicative reporting of extensive amounts of data. The Sanitation Districts already report all of the information required under Section 3.2 on a monthly or quarterly basis, depending on the treatment plant. ***We therefore support the language on pages 45-46 of the Staff Report that call for the reporting in the Proposed Policy to replace existing regional water board reporting requirements. Additionally, while Section 3.2 calls for reporting on a monthly basis, submittal of reports should not be required at more than a quarterly frequency, and preferably on an annual***	See responses to Comments 1.037 and 2.100. As requested, Amendment is revised to require annual submittal of monthly data.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	basis. Combining of three or twelve months of data into one quarterly or annual report will save resources on the part of recycled water producers to prepare the reports, and resources on the part of the water boards to review the reports. The State Water Board does not have such an urgent need for the data that it must be submitted on a monthly basis.		
36.026	Second, ***the Proposed Policy would not provide credit as beneficial reuse for a number of valuable environmental uses, including natural system restoration, wetlands, wildlife habitat, and required discharge for maintenance of minimum stream flows. Unfortunately, the only beneficial environmental use proposed to be reported is "recreational impoundments." As the state moves to encourage higher and higher percentages of beneficial use of recycled water, these critical environmental uses should not be overlooked.***	See response to Comment 34.016 and 6.003.	3. Goals, mandates, and reporting requirements
36.027	***Similarly, discharges of minimum instreams flows to inland surface waters should not be considered "disposal." Such discharges provide water supply benefits to downstream water users and/or wildlife, and thus discharges of these minimum flows should be considered a beneficial use.***	See responses to Comments 5.023 and 10.006. Amendment is revised as requested.	3. Goals, mandates, and reporting requirements
36.028	Third, ***the requirement for municipal wastewater treatment plants to report plant influent flows should be removed.*** Production of recycled water will be quantified directly, so reporting of influent flows will not provide any useful information. Additionally, some municipal wastewater treatment plants are not able to measure influent flows due to their configurations. If the Proposed Policy does include a requirement to report influent flows, such reporting should only be required where it is reasonably feasible.	Section 3.2.1 of the Amendment was revised to better reflect the manner in which wastewater is received by wastewater treatment plants. Influent volumes provide a necessary layer of quality assurance for the reported volumes of treated wastewater produced, discharged, and reused. While not identical, comparing the total volume of wastewater received by a treatment plant to the volume of treated wastewater produced and either discharged or reused would identify data errors caused by inaccurate estimates. Additionally, influent data is useful for understanding indoor water use,	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
		which may be useful for other Water Boards programs. Additionally, is unclear under what circumstances a facility treating wastewater would be incapable of providing influent data. NPDES permits require wastewater treatment facilities to report influent data to show compliance with technology-based standards. Furthermore, wastewater treatment facilities are configured to receive a set capacity of influent and should know the amount of wastewater that is being processed.	
36.029	Finally, Sections 3.2.1.4.1 and 3.2.1.4.2 call for reporting of the volume of treated recycled water delivered to a recycled water producer for further treatment, and for reporting of the volume of treated recycled water directly distributed for beneficial reuse. In many cases, neither of these scenarios is applicable. Instead, recycled water is distributed by a producer to other parties, such as wholesalers and retailers, for distribution. ***To avoid confusion, it is recommended that the word "directly" be removed from Section 3.2.1.4.2 (e.g., "Volume of treated municipal wastewater ~~directly~~ distributed for beneficial reuse…"), or that another category be added for distribution of recycled water by producers to other parties for distribution.***	Section 3.2 of the Amendment was revised to remove prescriptive detail in the reporting requirements and to allow for flexibility in reporting, which will better suit the myriad recycled water and wastewater agency relationships in the state. It is expected that recycled water producers will collaborate with wholesalers and retailers receiving their produced water to identify the volume distributed to each of the reuse categories prescribed in section 3.2.4 of the Amendment. Additionally, the word "directly" was removed from section 3.2.4 of the Amendment to avoid confusion over the reporting requirements.	3. Goals, mandates, and reporting requirements
36.030	**<u>Roles of State Water Board and Regional Boards</u>** Section 4.6 of the Staff Report discusses the roles of the State Water Board Division of Drinking Water (DDW) and the regional boards in the recycled water permitting process. While Figure 4-3 indicates that it is the role of only DDW to review Title 22 Engineering Reports, the text on page 47 of the Staff Report indicates that it also the role of the regional water boards to review Title 22 Engineering Reports. ***We recommend that the text of the Staff Report be amended to make it clear that it is DDW's role, not the regional board's role, to review Title 22***	Section 4.6 of the Staff Report with SED accurately describes the roles of DDW and the regional water boards regarding Title 22 Engineering Reports. Regional water boards administer recycled water permits; so, it is within their authorities to review the completed Title 22 Engineering Report and DDW's approval letter with permit recommendations before administering a permit. Water Code section 13523 provides that the regional board may require the submission of a preconstruction report (also known as a Title 22 engineering report) for the purpose of determining compliance with the uniform statewide	4. State agency roles

No.	Comment	Response	Categories
	Engineering Reports as they relate to compliance with Title 22.	recycling criteria. This report is described in 22 CCR 60323, which provides that the report must include any information specified by the regulatory agency. 22 CCR 60301.740 defines "regulatory agency" as the regional water board having jurisdiction over the recycling plant. Recycled water projects are assessed on a case-by-case basis by the regional water boards before they are permitted, to ensure protection of public health and the environment.	
36.031	DDW staff has the knowledge, expertise, and experience to interpret the Title 22 regulations. The regional boards should instead focus their review on the ROWDs/NOIs and the antidegradation analysis, with review of the Title 22 Engineering Report conducted only to the extent necessary to address these issues.	See response to Comment 36.030.	4. State agency roles
36.032	In some regions there have been significant delays in permitting of recycled water projects caused by the regional boards performing detailed reviews of compliance with Title 22 in Title 22 Engineering Reports, and clarifying these agency roles (i.e. limiting the Regional Board review only to elements relating to Basin Plan compliance/antidegradation) would minimize these delays.	See response to Comment 36.030.	4. State agency roles
36.033	**<u>Role of Department of Water Resources</u>** Section 4.3 of the Proposed Policy discusses the Department of Water Resource's review of urban water management plans and preparation of the California Water Plan***. This section should be broadened to include a discussion of the Department of Water Resource's review of agricultural water management plans.*** Agriculture is the largest overall user of water in the state, and also the largest user of recycled water. Expanding use of recycled water statewide needs to include greater consideration of	Changes were made to section 4.3 of the Amendment to include DWR's review of agricultural management plans pursuant to Water Code section 10845. Additionally, changes were made to section 3.1 of the Amendment to include a third goal to maximize the use of recycled water in areas where the groundwater basin is in a state of overdraft. These changes are consistent with the Water Code, the Governor's California Water Action Plan, and SGMA and further include agricultural participation in recycled water use.	4. State agency roles

No.	Comment	Response	Categories
	agricultural uses and the potential to expand recycled water use for agricultural irrigation.		
36.034	**<u>Wastewater Change Petitions</u>** Wastewater change petitions for recycled water projects have received substantial attention of late. In many instances, the need to obtain State Water Board approval under this process has resulted in considerable delays. While it would be helpful if the revisions to the Recycled Water Policy could ease or streamline the water change petition process for recycled water projects, the proposed revisions seem to be going in the other direction. It is not clear why the State Water Board is proposing to add additional requirements to implementation of recycled water projects.	The Amendment is consistent with the State Water Board's authority and the Division of Water Rights determination in section 5.1 of the Amendment is included to a) support early identification of whether a Water Code 1211 petition will be required for a given recycled water project or program and b) identify that the State Water Board's support of recycled water must be balanced with the other beneficial uses of that water under the State Water Board's public trust responsibility and CEQA, as applicable. While the determination step does not directly streamline the process, it does support an early consultation and identification of Water Code 1211 petition needs that could ultimately help avoid or minimize approval delays later in the process. See also response to Comment 7.006.	5. 1211 and WW Change Petitions
36.035	***If the State Water Board wishes to include language on water change petitions in its Recycled Water Policy, it is recommended that the language from Finding No. 32 of Order WQ 2016-0068-DDW be used, which reads as follows:*** ***"The use of recycled water that would otherwise be discharged to a watercourse can adversely affect the availability of water for beneficial uses of water downstream of the discharge point, including in-stream uses. Water Code section 1211 requires that: (1) the owner of any wastewater treatment plant obtain the approval of the State Water Board before making any change in the point of discharge, place of use, or purpose of use of treated wastewater where changes to the discharge or use of treated wastewater have the potential to decrease the flow in any portion of a watercourse, and (2) the State Water Board review***	See the response to Comment 7.008. Clarifying changes to section 5 of the Amendment have been made.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
	the proposed changes pursuant to the provisions of Water Code section 1700 et seq. In order to approve the proposed change, the State Water Board must determine that the proposed change will not operate to the injury of any legal user of the water involved. (Wat. Code, §1702.) The State Water Board also has an independent obligation to consider the effect of the proposed change on public trust resources and beneficial uses established for areas downstream of the discharge point, and to protect those resources where feasible. (National Audubon Society v. Superior Court (1983) 33 Cal.3d 419 [189 Cal. Rptr. 346].)"		
36.036	In particular, Section 5.1 adds a new requirement that was not previously in statute or the Policy – the requirement to obtain, prior to receiving state funding for a recycled water project, a determination from the State Water Board's Division of Water Rights (DWR) regarding the project, even when the project will not decrease the flow in any portion of a watercourse.	See response to Comment 8.036.	5. 1211 and WW Change Petitions
36.037	Additionally, Figure 4-3 of the Staff Report and language in the Staff Report on p. 47 indicates that such a determination must be obtained for all recycled water projects, even if no funding is being sought. In the past, a project proponent has been able to make such a determination on its own. DWR already has a huge backlog of petitions that need to be addressed, and having to obtain a determination from them raises a significant concern that this process will slow down projects and could bring them to a halt. DWR has already indicated that their processes can take years to complete. It is strongly inadvisable to add additional work to this already overburdened division, and in doing so add a potential delay to projects that will not decrease stream flows. The additional workload could also slow down the already very slow process for	While there is a large backlog of petitions at DWR, the State Water Board does not believe the determination step will substantively slow processing of projects. That said, the section was revised to include a self-certification option that would be submitted to the DWR. This will help expedite the review process and greatly reduce the likelihood of any delays for projects that are found to not require wastewater change petitions prior to implementation of recycled water projects. Also see the response to Comment 7.006.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
	projects that do need to obtain Wastewater Change Petitions for recycled water projects.		
36.038	Furthermore, the Proposed Policy and the Staff Report do not provide any information as to what would comprise a "determination." Would it consist of a letter, or could it be an email or a verbal confirmation? Would a formal process to request the determination be put into place? We are concerned that even if the process for a determination is set up initially as a simple process (i.e., simple request and an email reply) that the process will become more formal and burdensome over time, with DWR potentially expanding the making of any such determination into a complicated and time-consuming process.	The determination will function as a basic screening submittal form that will allow the party to answer set questions to help identify whether a wastewater change petition may be required. In some cases, such as if the wastewater treatment plant currently has an ocean outfall, it is clear that a wastewater change petition will not be required, and the determination process should be fairly simple. Also see the response to Comment 7.006.	5. 1211 and WW Change Petitions
36.039	Additionally, the Sanitation Districts strongly disagree with the inclusion of cumulative impacts in the evaluation of Wastewater Change Petitions. Therefore, Section 5.3 of the Proposed Policy is highly problematic. It would inappropriately amend the Recycled Water Policy to include language regarding the consideration of cumulative impacts as part of the California Water Code Section 1211 process. California Water Code Section 1211 explicitly states what must be considered as part of that process, and cumulative impacts are not included in the statute.	Cumulative impacts may be considered under CEQA and the State Water Board's public trust authority. See response to Comment 13.009.	5. 1211 and WW Change Petitions
36.040	Furthermore, CEQA statutes and regulations give the State Water Board the ability to analyze cumulative impacts, which is where that authority should remain. ***Section 5.3 should be deleted in its entirety.***	See response to Comment 13.009.	5. 1211 and WW Change Petitions
36.041	***Section 5.4 should also be deleted in its entirety.*** It is ambiguous and unnecessary. To the extent that projects have permits or other existing obligations they remain in effect unless expressly rescinded.	Section 5.4 was removed in response to the Comment, although portions of the section were maintained in section 5.3 of the Amendment to clarify the relationship between the petition approval authorities of the State Water Board and the permitting authorities of the State Water Board and regional water boards.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
36.042	Finally, Section 5.1 states that the State Water Board "processes and approves wastewater change petitions filed by wastewater dischargers for recycled water projects that have the potential to decrease the flow in any portion of a watercourse such as a river or stream". ***In order for this section to not be misinterpreted in the future, the wording should be changed to "will decrease."***	In response to the comment, section 5.1 of the Amendment was modified from "could decrease the flow" to "will decrease the flow."	5. 1211 and WW Change Petitions
36.043	In conclusion, in addition to the changes outlined above to Section 5 of the Proposed Policy, there are issues that we believe it would be helpful for the Water Board to work on with stakeholders and other agencies such as the Department of Fish and Wildlife, and ***we support the proposal that a workgroup be convened to develop strategies for improvements to the 1211 petition process.***	The State Water Board is open to future discussions to identify ways to streamline or improve the wastewater change petition process. Also see the response to Comment 7.006.	5. 1211 and WW Change Petitions
36.044	*Use of Existing Wells in Monitoring Plans* The existing Recycled Water Policy states that the "preferred approach to monitoring plan development" is to collect samples from existing wells to the extent feasible. The Proposed Policy, at Section 6.2.4.1.2, would remove use of existing monitoring wells as a "preferred approach" and simply state that use of such wells is allowed. This is problematic, because use of existing wells provides the most cost-effective means of monitoring the ground water basins. It is expensive and time-consuming to construct new wells. Sometimes regional board staff may not be as sensitive to cost considerations as is optimal, and indicating that the use of existing wells is a "preferred approach" sends a strong signal to the regional board staff reviewing the SNMPs that such wells should be relied upon if at all possible. ***We recommend that the "preferred approach" language be retained.*** This will help control costs for the SNMPs in the long run, which is important because there is no steady funding	Use of existing wells is cost-effective. However, as discussed in the Staff Report with SED, use of existing wells that are not designed to provide representative water quality information for an aquifer can provide data that may end up misrepresenting the total assimilative capacity. The State Water Board prefers groundwater data that is collected from monitoring wells that are designed for the purpose of collecting data that are representative of the aquifer. At the same time, the State Water Board recognizes that existing wells are a pragmatic and cost-effective means to collect data, which is why the Policy allows use of those wells.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	source for writing or maintaining the plans, nor is there funding available for the monitoring required as part of implementation.		
36.045	*SNMP Reporting Frequency* The Proposed Policy, at Section 6.2.4.1.3, would increase the reporting frequency of SNMP data from every three years to annually, and would require electronic reporting "to a database identified by the regional board". If the regional boards will only be assessing the data every 5 or 10 years, it is not clear why reporting needs to be conducted annually, instead of every three years. ***We recommend that the three year frequency be retained. Additionally, regarding electronic reporting, every effort should be made to not require duplicate reporting to multiple databases.***	See response to Comment 34.049. The five-year timeframe refers to the formal, comprehensive review of the basin, including the conceptual model (e.g., trends, total loading, etc.) included in the SNMP. The annual submittal of data is to allow for more frequent reviews of trends in certain areas of a basin that may be of concern.	6. Salt and nutrient management plans
36.046	*New Requirement to Determine Intended Outcome of All Implementation Measures* Section 6.2.4.4 of the Proposed Policy would add a requirement that SNMPs include not only the implementation measure that will be used to manage salts and nutrient loading, but also the intended outcome of each measure. This will impose an additional burden on stakeholders preparing SNMPs, to quantify the exact effect of each implementation measure. Such effects would need to be determined through expensive modeling. Placing additional burdens on SNMPs will only discourage their preparation, not encourage it. ***We recommend that the language requiring SNMPs to assess the intended outcome of each implementation measure be deleted.***	Section 6.2.4. of the Amendment acknowledges that "the degree of specificity within SNMPs will be dependent on a variety of site-specific factors." This degree of specificity also applies to the level of effort and degree of quantification involved in characterizing the intended outcome of each measure. Section 6.2.4.4 of the Amendment does not specify quantification of the "exact effect of each measure," as the commenter states. Stakeholder groups can propose a level of effort and degree of modeling/quantification involved with characterizing the intended outcome for each measure that is appropriate for the particular basin. Stakeholder groups are encouraged to work with stakeholders and regional water board staff in determining the level of detail and quantification that may be involved in characterizing the expected outcome of implementation measures.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
36.047	*Periodic Review of SNMPs* Section 6.2.6 of the Proposed Policy would require the regional boards, in consultation with stakeholders, to assess and review monitoring data generated from SNMPs every five years or, at minimum, ten years. The assessment would need to include an analysis of trends, an analysis of the adequacy of the monitoring network, an evaluation of the ability of any models used to simulate water quality, and a determination of available assimilative capacity. The State Water Board should be aware that such an extensive review would involve considerable effort and financial resources, on the part of the both the regional boards and the SNMP stakeholders.	Section 6.2.6 of the Amendment states that "the regional boards, in consultation with stakeholders, shall assess and review the monitoring data." This places the primary responsibility of the review on the regional water boards, in consultation with stakeholder groups. The State Water Board encourages the regional water boards to collaborate with stakeholders in this review process, including compilation of data in readily accessible forms that can facilitate assessment trends, and other means to streamline the review process. In addition, the State Water Board is working to develop tools and methods to assist the regional water boards in completing this review. Five years is an appropriate timeframe for review of water quality data collected pursuant to SNMPs. (See response to Comment 12.009).	6. Salt and nutrient management plans
36.048	If the regional boards do not have the resources to conduct the analysis, there is a strong possibility they will simply pass the burden of conducting the analysis onto the SNMP stakeholders. Even if regional board staff does the analysis, they may require the SNMP stakeholders to perform new model runs, which is expensive and time-consuming. While grant money was available to prepare many of the original SNMPs, it is not anticipated that grant money will be available to analyze the SNMPs going forward.	See response to Comment 36.047.	6. Salt and nutrient management plans
36.049	Additionally, groundwater quality changes very slowly, so requiring full analyses and updates of the plans every five years is not generally necessary and not a good use of resources.	See response to Comment 36.047.	6. Salt and nutrient management plans
36.050	Finally, knowing that a significant burden will be placed on them every five to ten years may discourage stakeholders from developing, or participating in the development, of SNMPs.	See response to Comment 36.047.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
36.051	***To address these issues, the Sanitation Districts recommend that the extensive reviews only be conducted every twenty years, unless there is a specific reason or changed condition that necessitates an earlier review.***	See response to Comment 36.047.	6. Salt and nutrient management plans
36.052	Sections 7.3.2.2.1, 7.3.2.2.2, and 7.3.2.2.3 contain certain conditions (e.g., approval unless unusual circumstances apply and no project-specific groundwater monitoring unless required under the applicable SNMP) that apply for recycled water projects that are eligible for streamlined permitting and where the statewide general order is not used. These conditions should also apply when the statewide general order is used. To make this clear and to prevent any future confusion, ***it is recommended that the language in Sections 7.3.2.2.1, 7.3.2.2.2, and 7.3.2.2.3 be included in Section 7.2.***	See response to Comment 4.012.	7. Permitting for Non-potable
36.053	Section 8.1.5 of the Proposed Policy discusses permitting for groundwater recharge projects conducting surface spreading of recycled water treated with reverse osmosis. The current Recycled Water Policy calls for approval of permit applications by regional boards for such projects within one year of receipt of the appropriate approvals and recommendations from CDPH (now DDW).	This comment is linked to Comment 36.054; see response to Comment 36.054.	8. Permitting for GWR
36.054	The Proposed Policy would add a caveat that links approval of the brine disposal method to approval of the water recycling permit for the groundwater recharge project. Such a linkage is inappropriate and could result in permitting delays. Any permitting required of brine disposal by the regional board should be done through the appropriate permitting process for the brine, such as an NPDES permit for ocean disposal. In some cases, brine disposal may not need permitting by the regional board at all (e.g., evaporation at a fully enclosed industrial facility with no discharge). In such cases, it is not appropriate to give	Brine disposal methods must be discussed with regional water boards for any project that creates brine. Determining whether and how brine disposal is permitted is within the current authority of the regional water boards; this provision does not create a new authority for regional water boards.	8. Permitting for GWR

No.	Comment	Response	Categories
	new authority to the regional boards to exercise approval authority where it does not currently exist. ***We therefore request that the phrase "provided that the project proposes a brine disposal method to the satisfaction of the regional water board" be deleted.***		
36.055	Section 11.2 of the Proposed Policy would terminate coverage under existing regional board general orders one year after the effective date of the Proposed Policy. Establishing a hard and fast deadline for termination of such orders does not take into account the potential need for more time by the regional boards in processing applications for coverage under Order WQ 2016-0068-DDW or a site- specific permit. Even if a recycled water producer or user submits a permit application in a timely manner, there may be circumstances where a regional board cannot process it by the deadline and then the recycled water system need to be shutdown***. Some provision for such a circumstance needs to be added to this section, to avoid interruptions of service in existing recycled water projects.***	See response to Comment 1.009 and 1.010. In response to this comment, Amendment is revised and time periods have been adjusted.	11. Permit review and update
36.056	**<u>Review of Existing Title 22 Engineering Reports</u>** The Proposed Policy, at Section 11.3.1, would add a requirement that the State Water Board, within three years of the policy effective date, review all Title 22 engineering reports issued prior to 2000. If the Title 22 engineering report was never prepared or is not consistent with current regulations, the State Water Board may require submittal of an updated report for review and approval. The State Water Board is certainly aware that DDW staff is already overloaded processing permit applications for numerous new or expanded reuse projects around the state. It would not be an effective use of resources to redirect staff from these important permitting efforts, which will serve to increase recycled water usage, to review old reports.	See response to Comment 1.015.	11. Permit review and update

No.	Comment	Response	Categories
36.057	Groundwater recharge projects have already had to do assessments of their compliance with the 2014 groundwater recharge regulations and are required to conduct five-year reviews of their engineering reports, so this requirement should not apply to them.	Section 11.3.3 of the Amendment was modified to state that groundwater recharge projects and reservoir water augmentation projects should update their Title 22 Engineering Reports consistent with the requirements in CCR, title 22.	11. Permit review and update
36.058	For nonpotable reuse, the key element in protecting public health is the degree of treatment required, including disinfection. Review of treatment processes should be handled through permitting, with no need for extensive review of old documents.	See response to Comment 1.015. Title 22 Engineering Reports are a required component of a recycled water permit under CCR, title 22, to ensure adequate protection of public health.	11. Permit review and update
36.059	Similarly, updating monitoring requirements for consistency can be done through amendments to Monitoring and Reporting Programs, without needing to resort to detailed Engineering Report reviews.	See response to Comments 1.015. Updates to Monitoring and Reporting Programs (MRPs) could be accomplished through a statewide order issued by the State Water Board Executive Director pursuant to Water Code section 13267 or by updating each MRP individually. However, this does not preclude the need to ensure each facility has a Title 22 Engineering Report approved consistent with the current Uniform Statewide Recycling Criteria.	11. Permit review and update
36.060	We believe that this proposed requirement would require a lot of staff resources without a commensurate public health, water quality, or water supply benefit, and the goal can be achieved in a more streamlined manner via the means mentioned above. ***We therefore request that Section 11.3.1 be deleted.***	See responses to Comments 1.015 and 36.059.	11. Permit review and update
36.061	Additionally, the Staff Report at p. 80 indicates that enrollment under Order WQ 2016-0068- DDW could not occur until the old engineering reports have been updated. This is likely to result in a significant delay in the transition of existing older water recycling permits to Order WQ 2016-0068- DDW.	See response to Comment 1.015.	11. Permit review and update
36.062	**Quality Assurance and Quality Control** Section 1 of Attachment A of the Proposed Policy specifies quality assurance/quality control (QA/QC) measures that must be in place in order for a laboratory to undertake constituent of emerging	See response to Comment 1.046.	10. CECs and Attachment A

No.	Comment	Response	Categories
	concern (CEC) monitoring, including bioanalytical screening. We have several concerns about this section. *Quality Assurance Project Plan* The introductory language to Section 1 of Attachment A requires submission and approval of a quality assurance project plan (QAPP) prior to beginning any sampling and analysis. However, there are several different QAPP templates available, including ones developed by the U.S. EPA, the Surface Water Ambient Monitoring Program (SWAMP), and the State Water Board's Office of Information Management and Analysis. ***It would be helpful if the Staff Report would include a list of required QAPP elements and/or include a list of which QAPP templates are acceptable.***		
36.063	*TNI Compliance* Attachment A, Section 1.1 allows use of the National Environmental Laboratory Accreditation Conference Institute (TNI), 2016 Standard to demonstrate that an adequate quality management system is in place. ***However, the Proposed Policy does not specify what documentation needs to be maintained to demonstrate compliance with the TNI requirements. It would be helpful if this could be discussed in the Staff Report.***	See response to Comment 1.046.	10. CECs and Attachment A
36.064	Additionally, it is our understanding that the 2016 TNI standard has not yet been implemented by TNI. Instead, the 2009 Standard is currently being used. ***Language needs to be added to the Proposed Policy allowing use of the 2009 Standard until accreditation under the 2016 TNI standard is available.***	See response to Comment 1.046.	10. CECs and Attachment A

No.	Comment	Response	Categories
36.065	*Inclusion of Test Method QA/QC Procedures in the Quality Manual* Attachment A, Section 1.1.2.1 states, "The quality manual shall address all quality assurance and quality control practices to be employed by the laboratory and shall, at least, include the quality assurance and quality control requirements specified for the CECs and bioanalytical test methods." ***Quality control requirements for individual methods are typically specified in the method Standard Operating Procedure (SOP) and not in the quality assurance manual. The Proposed Policy should be revised accordingly.***	See responses to Comments 1.046 and 1.049. In addition, Standard Operating Procedures are included in a quality manual, and thus the quality control requirements for individual methods should also be included.	10. CECs and Attachment A
36.066	*Quality Manual Updates* Attachment A, Section 1.1.2.2 states, "The laboratory technical manager shall review and amend if necessary, the quality assurance program and quality manual at least annually. The technical manager shall also review and amend the quality assurance program and manual whenever there are changes in the methods or laboratory equipment employed, in the laboratory structure or physical arrangements, or changes in the laboratory organization." This language is problematic, because in most laboratories reviewing and updating the QA program and quality manual are the responsibilities of the quality manager and not the technical manager. This requirement would only make sense in cases where the quality manager and the technical manager are the same person.	Section 1.1.2.2. was removed from the Amendment.	10. CECs and Attachment A

No.	Comment	Response	Categories
36.067	Additionally, requiring the quality manual to be updated whenever there are changes in methods, equipment, laboratory structure and arrangements, and laboratory organization will create a lot of unnecessary work. In most laboratories, methods and equipment are updated on a routine basis so capturing these changes on an on-going basis is necessary; however, ***updating the QA manual to reflect these changes should be done during the annual review process.***	While text regarding annual amendments to the quality manual has been removed from the Amendment, response to Comment 14.020 addresses when the QAPP needs to be updated.	10. CECs and Attachment A
36.068	*Quality Assurance Program Implementation Records* Attachment A, Section 1.1.2.3 requires laboratories to maintain records of the implementation of their quality assurance programs. ***It would be helpful if a list could be provided of the types of implementation records that need to be maintained by laboratories.***	Section 1.1.2.3 was removed from the Amendment, however, see response to Comment 8.030.	10. CECs and Attachment A
36.069	Attachment A, Sections 1.2.2 and 1.3.2 require submittal of method detection limit (MDL) studies to the State Water Board for review and approval prior to beginning sampling and analysis, to ensure that required reporting levels (RLs) are met. However, the procedures used to conduct the MDL study and RL limit verification are not specified. It would be helpful if the Staff Report could address this issue, including indicating whether the procedure listed in the 2016 TNI Standard is acceptable and whether there are other acceptable procedures.	See responses to Comments 1.046 and 1.049.	10. CECs and Attachment A
36.070	**<u>Selection of Analytical Chemistry Methods</u>** Attachment A, Section 1.2.1 provides a hierarchical order for choosing analytical chemistry methods for analysis of CECs, including a requirement to use U.S. EPA-approved methods if available. Inclusion of this hierarchy is inconsistent with the recommendations from the expert panel convened in 2017 and 2018 to develop monitoring recommendations for CECs in recycled water (CEC Expert Panel). The CEC Expert	See response to Comment 1.049.	10. CECs and Attachment A

No.	Comment	Response	Categories
	Panel report (*Monitoring Strategies for Constituents of Emerging Concern in Recycled Water*, Southern California Coastal Water Research Project, April 2018; CEC Expert Panel Report) instead simply listed the standardized methods that have applicability for CECs in recycled water without making a recommendation as to preferential use of any of them.		
36.071	The proposed hierarchical order specifies that "U.S. EPA–approved methods", if available, must be used. While the term "EPA-approved methods" is not defined in the policy, it appears to include methods published by EPA that are not formally included in 40 Code of Federal Regulations Part 136.	See response to Comment 1.049.	10. CECs and Attachment A
36.072	It would therefore include EPA Method 1694, which is the method for analysis of pharmaceuticals and personal care products (PPCPs). The Sanitation Districts have serious concerns about specifying that EPA Method 1694 be used preferentially over Standard Method 6810, and believe that instead Standard Method 6810 should be the required method, or at minimum at least an allowable method, for gemfibrozil, iohexol, sucralose, and sulfamethoxazole. Standard Method 6810 is superior to EPA Method 1694 for these constituents. Standard Method 6810 was developed due to the shortcomings with EPA Method 1694, which is a non-specific method for water, particulate, and sediment. EPA Method 1694 has not been verified at multiple laboratories. In contrast, Standard Method 6810 was developed specifically for wastewater. Its development and validation included participation of a number of key players including Shane Snyder (CEC Expert Panel member), Jorg Drewes (CEC Expert Panel member), Andy Eaton of Eurofins, and some European laboratories. It was validated using a round robin of twenty laboratories, and the method was selected by	See response to Comment 1.049.	10. CECs and Attachment A

No.	Comment	Response	Categories
	Standard Methods because it was the best method available. While EPA Method 1694 can analyze for a wider spectrum of compounds, Standard Methods analyzes for a smaller set of compounds but does it much more accurately. Use of Standard Method 6810 in lieu of EPA Method 1694 will provide more accurate data to the State Water Board. Note that Standard Method 6810 can meet all the RLs specified in the Proposed Policy. While only thirteen compounds are listed in Standard Method 6810 as analytes, the method can be extended to include a number of other analytes, including iohexol and sucralose. The introduction to the method states, "This method may be applicable for other PPCPs if the laboratory can demonstrate acceptable recovery, precision, and stability of the compounds using the quality control (QC) protocols in Section 6020 and in this method." The Sanitation Districts' laboratory has validated Standard Method 6810 for iohexol and is the process of conducting the validation for sucralose. It is anticipated that other laboratories would not have difficulty doing the validation for these two compounds as well.		
36.073	Regarding analysis for 1,4-dioxane, the Proposed Policy states that EPA Method 522 is the only method available. This is not correct. The Sanitation Districts have been successfully using a modified version of EPA Method 8270 to conduct 1,4-dioxane analysis. EPA Method 8270 is a wastewater method that is essentially the same as EPA Method 522, which is a drinking water method. Both methods use gas chromatography/mass spectrometry (GC/MS) as the heart of the method and are essentially the same method. We therefore believe that EPA Method 8270 should be an allowable method for 1,4-dioxane monitoring.	EPA method 8270 would be an allowable method for 1,4-dioxane. See response to Comment 1.049.	10. CECs and Attachment A

No.	Comment	Response	Categories
36.074	***To address the issue of methods to be used for CEC monitoring, the Sanitation Districts recommend that the language in the current version of the Recycled Water Policy (Attachment A Section 1.1) be retained.*** This language was developed based on extensive review and comment on this issue during the public comment period, and reflects a reasonable means of choosing appropriate analytical methods.	The issue of selection of analytical methods has been addressed. See response to Comment 1.049.	10. CECs and Attachment A
36.075	**Selection of Analytical Chemistry Reporting Levels** Regarding the required RL for 1,4-dioxane, the Sanitation Districts currently attain an RL of 0.4 µg/L for 1,4-dioxane using EPA Method 8270, and are looking at the possibility of lowering it further. EPA Method 522 can achieve an RL of 0.1 µg/L, but only under clean matrix conditions. Such conditions may not be present in all tertiary effluents that are used to feed surface spreading groundwater recharge projects. ***Due to needing a very clean matrix to attain an RL of 0.1 µg/L, the Sanitation Districts recommend that the required RL for 1,4-dioxane be increased to at least 0.2 µg/L, or preferentially 0.4 µg/L.*** Both of these numbers are well under the regulatory standard for 1,4-dioxane, which is a reporting level of 1 µg/L.	See responses to Comments 1.049 and 14.016. The application of the Table 1 footnote to 1,4-dioxane indicates that the regional water board could approve an alternative reporting limit.	10. CECs and Attachment A
36.076	**Use of Bioanalytical Tools** Attachment A of the Proposed Policy includes requirements to both monitor potable water reuse projects using bioanalytical screening tools (also called bioassays) and to take required actions based on the results obtained. These requirements are highly troublesome, as bioanalytical screening tools and our ability to interpret results from these tools have not reached a point where they are ready to be used on a routine, required basis. Specific comments on use of	See responses to Comments 8.003, 8.018, and 8.020. Sections 7.2.1 and 7.4 of the 2018 Panel report indicate that *in vitro* bioassays ER-α and AhR are ready to use for screening in recycled water through a phased implementation approach. Adverse outcome pathways are defined for ER-α and AhR bioassays. Also see response to Comment 10.009.	10. CECs and Attachment A

No.	Comment	Response	Categories
	bioanalytical methods are provided below. *Required Monitoring is Not Consistent with the Direct Potable Reuse Expert Panel Report* The issue of whether to require use of bioanalytical tools was addressed extensively in the final report of the expert panel convened to evaluate the feasibility of direct potable reuse (DPR Expert Panel). *(Expert Panel Final Report, Evaluation of the Feasibility of Developing Uniform Water Recycling Criteria for Direct Potable Reuse*, State Water Board, August 2016; DPR Expert Panel Report). The DPR Expert Panel recommended against routine use of bioassays at this time, stating "Bioassays have a potential role in the identification of yet-to-be discovered contaminants, but the Expert Panel does not recommend the routine use of bioassays in monitoring programs for DPR projects at this time." (DPR Expert Panel Report, p. 7.) Instead, the DPR Expert Panel indicated that use of bioassays should be limited to research applications, stating "Bioassay-directed fractionation is a useful research tool for identifying compounds in recycled water that merit further evaluation. For this reason, research efforts that employ bioassays and non-target screening analysis simultaneously are encouraged to be used to discover new contaminants of concern in municipal wastewater and water produced by DPR projects." (DPR Expert Panel Report, p. 7.) The DPR Expert Panel Report noted several reasons for these conclusions. The main reason was that clear and quantifiable risk relationships have not yet been developed between bioassays results and adverse health effects.		

No.	Comment	Response	Categories
36.077	Additionally, guidance needs to be developed for the appropriate technical interpretation of the data relative to health risk and the communication of the results.	The initial assessment monitoring phase will provide the data to improve and refine the bioanalytical assessment framework in section 5 of Attachment A. Additionally, convening the Bioanalytical Advisory Group and the outcomes of the bioanalytical grant agreement will also help improve the data interpretation. See responses to Comments 8.016 and 8.022.	10. CECs and Attachment A
36.078	Finally, a certification process needs to be established that would require the standardization of bioassays, methods of concentrating samples from water, and identifying methods for minimizing and/or eliminating false positives and false negatives, as well as describing the methods and quality control.	See responses to Comments 1.046, 1.049, and 6.006.	10. CECs and Attachment A
36.079	*Implementation of Bioassay Monitoring is Not Consistent with CEC Recycled Water Expert Panel* The Proposed Policy not only calls for required routine monitoring of recycled water in potable reuse projects using bioassays, in contradiction with the DPR Expert Panel Recommendations, it includes a suite of required response actions based on the results obtained. This is inconsistent with the recommendations from the CEC Expert Panel. The CEC Expert Panel Report instead recommended a phased approach (see pp. 78–79 and 83 of the CEC Expert Panel Report).	See responses to Comments 8.003, 8.018, 8.020, 10.009, 10.014, and 10.027.	10. CECs and Attachment A
36.080	Phase I would consist of data collection using the estrogen and aryl hydrocarbon (ER-α and AhR) assays for screening of potable reuse facilities. Phase II would be a pilot evaluation of the interpretive framework for bioassay monitoring results, using initial monitoring trigger levels (MTLs) to guide appropriate response actions. Phase III would constitute full implementation of bioanalytical monitoring, where validated and certified bioanalytical methods would be an integral component of routine screening/monitoring of recycled water quality.	See responses to Comments 8.003, 8.018, 8.020, 10.009, 10.014, and 10.027.	10. CECs and Attachment A

No.	Comment	Response	Categories
36.081	The CEC Expert Panel Report specifically recommends against implementation of required response actions at this time, stating, "The Panel recognizes the need for a robust interpretive framework for bioanalytical monitoring results and has proposed a framework to establish monitoring trigger levels and appropriate response actions. However, the Panel feels that requiring response actions during Phase I data collection is premature." (p. 83; emphasis added.) This was reiterated several times, including on p. 102 and on p. 82, "The Panel further recommends that requiring response actions during the initial data collection phase is premature and, thus not appropriate, until such methods are fully validated and certified by the appropriate entities [e.g., the State Water Board's Environmental Lab Accreditation Program (ELAP)], and that the interpretive framework outlined in 7.3 has matured and has been subject to a critical evaluation by water quality experts, State Water Board personnel, and stakeholder representatives." Jumping ahead of the CEC Expert Panel recommendation for a phased approach into full implementation is inappropriate and could lead to unsupported conclusions regarding the safety of recycled water. ***We therefore support use of the phased approach recommended by the CEC Expert Panel.***	See responses to Comments 8.003, 8.018, 8.020, 10.009, 10.014, and 10.027.	10. CECs and Attachment A
36.082	The Sanitation Districts acknowledge that an initial draft of the CEC Expert Panel Report, released January 31, 2018, did contain a proposed list of actions that could be taken if a bioassay result was above a screening level. However, after receiving and considering public comment on this issue, the CEC Expert Panel made a reasoned choice to not include this list in their final report. The Panel instead chose to revoke its initial recommendation to establish, at this	See responses to Comments 8.003, 8.018, 8.020, 10.009, 10.014, and 10.027.	10. CECs and Attachment A

No.	Comment	Response	Categories
	time, recommended actions to be taken if bioanalytical screening triggers are exceeded.		
36.083	At the June 11, 2018 State of California Constituents of Emerging Concern Bioanalytical Screening of Recycled Water Workshop (Bioassay Workshop), State Water Board staff indicated that they overrode the Expert Panel recommendations so that the framework of responses to bioassays would be consistent with the framework of responses for the analytical chemistry results. This attempt at consistency is misguided. The Expert Panel is the entity that developed the framework for the analytical chemistry results, and if the Panel had believed that a similar framework was appropriate at this time for bioanalytical screening results they would have proposed one. Instead, they made a deliberate choice not to do so. It is inappropriate for the State Water Board to override the CEC Expert Panel, which was specifically convened to provide technical expertise on this topic.	See response to Comment 31.025.	10. CECs and Attachment A
36.084	Finally, as further detailed below, the Proposed Policy includes a number of elements that were not included in the CEC Expert Panel Report, including imposition of required RLs, establishment of MTLs, and no formation of a multi-stakeholder advisory group to guide the process forward. Again, it is inappropriate for the State Water Board to second guess the CEC Expert Panel, which was specifically convened to provide technical expertise on this topic.	See responses to Comments 31.025 and 8.016.	10. CECs and Attachment A
36.085	*Appropriate Thresholds of Concern for Human Health Have Not Yet Been Developed* The DPR Expert Panel Report very clearly cautioned against routine usage of bioassays to assess potable reuse water quality until a clear and quantifiable risk relationship between the bioassay result and adverse health effects had been developed through an	The selection of 3.5 ng/L for Phase I data collection represents a reasonably conservative threshold to initiate response actions to identify the sources of bioanalytical response in the baseline and standard operating monitoring phases. The PNECs for 17β-estradiol and 17α-ethinylestradiol given in Table D.3 of the Final Report of the Science Advisory Panel show a wide range of values for both compounds, which are both strong ER- α agonists with	10. CECs and Attachment A

No.	Comment	Response	Categories
	established adverse outcome pathway consistent with those used to develop maximum contaminant level goals (MCLGs) and public health goals (PHGs). The CEC Expert Panel Report attempted to address this gap by proposing a framework to derive a MTL for a bioassay using a predicted no effects concentration (PNEC) for a chemical that is known to cause a response on the bioassay (see CEC Expert Panel Report, Textbox 7.1, p. 77). The CEC Expert Panel Report example of an MTL derivation was for 17α-ethinylestradiol (EE2) and called for using a PNEC of 3.5 ng/L. However, no clear basis was provided for the choice of a PNEC of 3.5 ng/L (the reference provided, Cadwell et al., 2010, does not contain any PNECs). In contrast, the PNEC for EE2 used by the CEC Expert Panel for assessment of analytical chemistry data was based on the PNEC from the USEPA CCL3 list, which is 28 ng/L (see CEC Expert Panel Report, Table D.3). It is unclear why a value an order of magnitude lower (3.5 ng/L versus 28 ng/L) was chosen for the bioassay in comparison to the analytical chemistry threshold.	similar in vitro potencies. The most conservative PNEC is 0.9 ng/L 17β-estradiol (USEPA CCL3), which was considered to be unrealistically low by the Panel, hence a PNEC that was judged to be conservative yet reasonable for application was selected. In addition, the correct reference for the PNEC of 3.5 ng/L 17α-ethinylestradiol (as cited in Table D.3 of the Final Report of the Science Advisory Panel) is: Snyder et al. 2008. Toxicological Relevance of EDCs and Pharmaceutical in Drinking Water. AWWA Research Foundation.	
36.086	The State Water Board recently released a letter ("Re: Information request for bioscreening endpoints (email dated 2/2/18; revised 5/14/18)," May 14, 2018, from Keith Maruya of SCCWRP to Tessa Fojut of the State Water Board) that was used as the basis to establish MTLs for the ER-α and AhR bioassays. This letter was apparently the result of the State Water Board asking the CEC Expert Panel to propose "action levels" for these two bioassays. In this letter, the Expert Panel made it clear that any level established should not be used as a regulatory limit but instead be used only for screening level analysis, and the Panel proposed use of the term "bioscreening level." The Panel recommended that 17-β estradiol (E2) be used instead of EE2 as the reference constituent for the ER-α assay, and that a bioscreening level of 3.5 ng/L be	See response to Comment 30.008.	10. CECs and Attachment A

No.	Comment	Response	Categories
	used. The basis for the 3.5 ng/L level was the PNEC for EE2, since the activity of E2 is within a factor of two of the activity for EE2 (although, as noted above, the analytical chemistry threshold for EE2 is considerably higher at 28 ng/L). The letter also recommended against setting any health-based bioscreening level for the AhR assay at this time, but did recommend setting the required RL for TCDD at of 0.5 ng/L.		
36.087	***Given the CEC Expert Panel's clear reluctance to set thresholds for further action at this time, the State Water Board should not include MTLs for the ER-α or AhR assays at this time.*** This is especially clear-cut for the AhR assay, as the Panel did not provide any value that could be used as an MTL, and instead stated that one should be developed in the future as more information becomes available. It is highly problematic for the State Water Board to set a MTL with no technical basis, especially considering the potential adverse impact setting such an MTL could have on the perceived safety of recycled water used for potable applications.	See responses to Comments 8.018, 28.004, and 30.008.	10. CECs and Attachment A
36.088	*Justification for Establishment of Monitoring Trigger Levels at This Time is Not Valid* The Staff Report justifies the inclusion of MTLs in the Proposed Policy by stating, "Providing monitoring trigger levels to compare bioanalytical screening tool results to and response actions for different levels of bioanalytical results provides context for the results and why there is a need for monitoring with bioanalytical screening tools. If monitoring trigger levels, which are thresholds of concern based on human health effects, were not included, then the need to monitor with bioanalytical screening tools would not be clear." (p. 73). The Sanitation Districts strongly disagree with this conclusion.	See responses to Comment 8.003, 8.018, 8.020, 28.004 and 30.008 for the rationale for including the response actions for the bioanalytical screening tools.	10. CECs and Attachment A

No.	Comment	Response	Categories
36.089	The CEC Expert Panel is proposing a phased approach to implementation of bioanalytical monitoring. The first phase, Phase I, would be a data collection effort to determine the ranges of responses for bioassays. This data would then be used as information for subsequent phases, including a Phase II pilot evaluation of the interpretive framework for bioassays. Once these phases have been completed, and lessons learned from them implemented in the program, then the full program would be rolled out as Phase 3. There is value to implementing Phase I, with data collection only, because not only will it determine the ranges of responses for bioassays, but because implementation of Phase I will serve as a beta test of the bioassays, providing additional time to work out problems that arise during implementation, including laboratory availability, willingness of laboratories to conduct the needed quality assurance verifications, and variation in results among different commercial assay kits.	See responses to Comments 8.003, 8.018, 8.020, and 6.006.	10. CECs and Attachment A
36.090	*Bioanalytical Testing is Not the Same as Analytical Chemistry Testing* The State Water Board needs to be aware bioanalytical testing is at a very different state of development than analytical chemistry testing. Analytical chemistry testing for organic compounds has been well established for many decades, and is routinely used in required monitoring programs. Utilities are familiar and comfortable with such testing. Extension of analytical chemistry methods to quantify new emerging compounds was therefore accomplished relatively easily, although there were issues with unreliable results when the test methods for emerging compounds were first rolled out. Those issues have been mostly resolved, and there is a high degree of comfort among utilities emerging compounds	See responses to Comment 31.005.	10. CECs and Attachment A

No.	Comment	Response	Categories
	can be reliably quantified using analytical chemistry. In contrast, bioanalytical methods are an entirely new field of testing. While bioanalytical methods have been used in research efforts for many years, they have not been routinely used for required monitoring.		
36.091	It is therefore prudent to move forward cautiously as these new methods as moved from research applications to routine, required monitoring, as there may be unexpected hurdles during the implementation phase and unanticipated results may occur. ***The Sanitation Districts support the CEC Expert Panel's recommendation to test with bioanalytical methods for a few years before setting thresholds for further actions based on results.*** The roll out period can be used to further develop testing infrastructure and to develop a broader sense of expected results.	See responses to Comments 8.003, 8.016, 8.018, 8.020, and 8.022.	10. CECs and Attachment A
36.092	*Public Perception of Bioanalytical Screening Results Must be Considered* The intent of the addition of bioanalytical screening to monitoring for potable reuse projects is to provide additional assurances to the public regarding the safety of recycled water. However, this could backfire if MTLs are set at overly conservative thresholds. At the June 20, 2018 State Water Board hearing on the Proposed Policy, State Water Board staff indicated that it was acceptable to move forward with bioanalytical screening now because the required response actions are minor (e.g., continuing to monitor and contacting the Water Boards to discuss additional actions) and because staff did not expect any test results to be above the proposed trigger levels. However, at the Bioassay Workshop, the CEC Expert Panel member present, Dr. Nancy Denslow, indicated that no data was available for the ER-α or AhR	The MTLs for Table 3 in Attachment A are protective of public health and not overly conservative. See responses to Comments 8.018, 8.020, 28.004, and 30.008 regarding the monitoring trigger levels. In addition, while the AhR monitoring trigger level was exceeded for GAC and UV/AOP treated recycled waters, the samples exceeded the trigger levels by less than a factor of 2, for which the resulting response action is to continue monitoring at the same frequency.	10. CECs and Attachment A

No.	Comment	Response	Categories
	bioassays for water that had treated by soil aquifer treatment (SAT) after surface spreading. This is a major gap in information, and would be easily addressed by collecting data at existing projects for several years before establishing MTLs. Additionally, the only AhR bioassay data presented at the Bioassay Workshop indicated that the proposed MTL was exceeded for both GAC and UV/AOP treated recycled waters (see Slide 10, "Current Status of Bioanalytical Methods," Alvine Mehinto, June 11, 2018).		
36.093	If recycled water for potable reuse exceeds thresholds are established by the state, it could lead to a serious lack of public confidence in the recycled water. Although the thresholds may be conservative, the public may not appreciate this nuance. Members of the public will likely simply point to the fact that their water supply is being supplemented with water above state-established thresholds. It is critical to have adequate data on the expected results of the bioassays before establishing any threshold such as an MTL, so that serious consideration can be given to the degree of conservatism appropriate for the threshold to ensure public confidence is not undermined.	See responses to Comments 8.016 and 8.022.	10. CECs and Attachment A
36.094	*Availability of Laboratories to Perform Services* The Sanitation Districts are concerned that adequate commercial laboratory capacity may not be available to perform the proposed bioanalytical screening. The CEC Expert Panel Report indicates that there are currently four labs that can "provide services, including bioanalytical screening of organic extracts of water samples" (p. 71). The four labs cited are BDS, INDIGO Biosciences, IonTox, and Attagene, Inc. The Sanitation Districts are in the process of contacting each laboratory to confirm that they can perform the proposed analyses and to obtain quotes for their services. Note that none of the laboratories are located	See responses to Comments 1.046 and 1.049, and 6.006.	10. CECs and Attachment A

No.	Comment	Response	Categories
	in California, and (BDS) is in Amsterdam. The need to preferentially use EPA approved methods, meet very low reporting levels, submit the results of a method detection limit (MDL) study and RL verification data in advance, have a documented quality management program in place, and submit extensive quality assurance/quality control (QA/QC) documentation may further limit the number of laboratories available and willing to conduct the analyses.		
36.095	*Requirement to Preferentially Use EPA Methods* Attachment A Section 1.3.1 requires use of EPA methods where they are available, and if no such methods are available then the State Water Board is to be consulted regarding an appropriate method. This requirement appears to apply to both the extraction step and the analysis step. For the extraction step, utilities that cannot perform their own extractions using EPA method will be limited to sending their samples to laboratories that perform extractions using EPA methods.	See responses to Comments 1.046 and 1.049.	10. CECs and Attachment A
36.096	We have not yet been able to obtain information from the four laboratories listed as to whether they are using EPA methods for extractions. For the analyses, it is also not clear if any of the laboratories are using EPA methods. Note that if only one laboratory runs an EPA method, then the proposed structure of the regulation would require all samples to be sent only to that laboratory. If there is an interruption of service at that laboratory, then it would be impossible to run samples. ***For these reasons, the Sanitation Districts recommend against inclusion of a requirement to only use EPA methods when available. As stated above, we instead recommend retaining the language in the current Recycled Water Policy regarding choice of methods.***	See responses to Comments 31.017, 1.046, 1.049, and 6.006.	10. CECs and Attachment A

No.	Comment	Response	Categories
36.097	*Quality Management Requirements* Attachment A Section 1.1 of the Proposed Policy requires compliance with TNI standards or certain quality assurance requirements. The Sanitation Districts have not yet been able to determine if the four laboratories listed in the CEC Expert Panel Report have acceptable quality management systems in place. We have found that BDS maintains ISO/IEC 17025 accreditation for certain analyses, and that IonTox is pursuing ISO certification for the bioassays. It is our understanding that the ISO/IEC 17025 certification is the international standard on which TNI is based. ***We recommend that ISO/IEC 17025 be added to the Proposed Policy as an acceptable quality management system.***	See response to Comment 1.046.	10. CECs and Attachment A
36.098	*Analytical Costs May be Underestimated* Table 4-6 (p. 74) of the Staff Report provides cost estimates for conducting the two required bioanalytical screening tools (ER-α & AhR). While this table includes the costs of purchasing kits and conducting tests, it does not include the considerable costs that would be incurred to develop general technical knowledge, train staff, conduct a MDL study, obtain certification, and conduct inter-laboratory calibration studies. ***The table should be revised to include these costs.***	See response to Comment 35.010.	10. CECs and Attachment A
36.099	*Monitoring Trigger Level for AhR Set at the Reporting Level* ***The monitoring trigger level (MTL) for the AhR assay is set at the same level as the RL, 0.5 ng/L. This is an inappropriate practice*** as it essentially means that the required response actions in Table 10 of Attachment A Section 5.3 would be based on bioanalytical equivalent concentration (BEQ)	See response to Comment 26.018.	10. CECs and Attachment A

No.	Comment	Response	Categories
	measurements that are below the method RL, meaning they are estimated values only.		
36.100	For example, consider a lab that performs an MDL study and determines their method MDL is 0.1 ng/L for the AhR assay. If the lab analyzes a recycled water sample using the AhR assay and determines the BEQ for the sample is 0.4 ng/L the result would be reported as an estimated value or < RL. However, according to Table 10 the BEQ/MTL ratio for this example would be 0.4 ng/L ÷ 0.5 ng/L = 0.8. From Table 10 the 0.8 ratio requires the Response Action of "Continue to monitor". The problem is that the 0.4 ng/L BEQ measurement, a value between the MDL and the RL, is an estimated value only and does not carry the same level of analytical confidence that one has with values at or greater than the RL. We can be confident that values at or above the RL carry a known level of certainty in terms of precision and accuracy, not so with values below the RL. Hence, using measured BEQs below the RL means that recycled water producers would be required to make Response Actions using estimated values with low confidence rather than truly quantitative data. It should be noted that the MTL for the ER-α assay is set at 3.5 ng/L (Table 9, Section A-5.3), seven times greater than the RL, suggesting that the concern described here may not be as significant for ER-α data.	Table 10 in Attachment A was revised to address this issue. The first row now says, "If BEQ/MTL ratio is consistently less than 0.1 for ER-α or 1.0 for AhR, A) After completion of the baseline monitoring phase, consider decreasing monitoring frequency or requesting removal of the endpoint from the monitoring program." The second row now says, "If BEQ/MTL ratio is greater than 0.1 and less than or equal to 10 for ER-α or greater than 1.0 and less than or equal to 10 for AhR, B) Continue to monitor." In addition, the Water Boards maintain discretion to reduce or discontinue monitoring on a case-by-case basis.	10. CECs and Attachment A
36.101	*Bioassay Equivalency* It should be noted that different bioassays will give different responses to different chemical signatures. While all may be calibrated to have a threshold at a certain chemical equivalent (e.g., 3.5 ng/L for EE2), the bioassays will have varying sensitivities to other chemicals present. A recent literature article (Kunz, P.Y., et al. (2017) Water Research. 110: 378-388) compared five different estrogen transactivation	However, the bioassays have undergone interlaboratory comparisons (see Mehinto, A.C., Jia, A., Snyder, S.A., Jayasinghe, B.S., Denslow, N.D., Crago, J., Schlenk, D., Menzie, C., Westerheide, S.D., Leusch, F.D.L., Maruya, K.A. (2015) Interlaboratory comparison of in vitro bioassays for screening of endocrine active chemicals in recycled water. Water Res 83: 303-309.). It will not be possible to assess variation among different laboratories until the recycled water producers begin to collect the data. The data from the initial assessment monitoring phase can be	10. CECs and Attachment A

No.	Comment	Response	Categories
	assays (YES, ERα-CALUX, MELN, T47D-KBluc, and GeneBLAzer-ERα) and indicated a coefficient of variation of 32% between all five assays across all tests performed. Due to this variation, end users may get significantly different results even though they targeted the same receptor (i.e., the ER- α or the AhR). Recommendations regarding acceptable levels of variation between the different bioassays available for each receptor type should be established, and bioassays with acceptable degrees of variation should be identified in a rigorous intercalibration study. The CEC Expert Panel acknowledged this issue in Section 7.5.3 of the CEC Expert Panel Report (pp. 82-83). To address this issue, the Panel recommended that simple mixtures with agonists and antagonists of various potencies be evaluated. ***Such an evaluation has not yet been conducted and should be done.***	used to refine the assessment framework and make any revisions before implementing the baseline assessment phase. Also see response to Comment 1.049.	
36.102	*Interlaboratory Testing of Extraction/Bioassays Pairs Needed* To ensure accuracy and reliability in bioanalytical screening, an interlaboratory round robin testing of paired extraction/bioassay needs to be conducted. This is necessary to verify that consistent results can be obtained across laboratories when running the same sample. Without such a round robin testing effort, there is no assurance that the results being obtained are consistent.	See response to Comment 36.101.	10. CECs and Attachment A
36.103	*No Guarantee of a Monitoring Off-Ramp* Another problematic aspect to the Proposed Policy is that the only apparent way for recycled water projects to discontinue monitoring, per Table 10, is to achieve a BEQ/MTL ratio consistently less than 0.1. The only way to achieve this for the AhR assay is to measure a BEQ of < 0.05 ng/L for the recycled water sample, which is a full order of magnitude below the RL and	See response to Comment 36.100.	10. CECs and Attachment A

No.	Comment	Response	Categories
	possibly below the laboratory's experimentally determined MDL. This approach may very well lock recycled water projects into continuous monitoring at higher frequencies. Even then, the values obtained would be below the RL and thus would be non-quantitative, estimated values only, where there is no confidence in their precision and accuracy.		
36.104	The prescribed approach will force recycled water projects to preferentially select laboratories that can achieve the lowest bioassay detection limits to ensure the project has the best opportunity of achieving the BEQ/MTL of <0.1. In essence, this framework favors laboratories and methods that can achieve the lowest detection limits even though the results are well below the RL and potentially below the MDL as well.	See responses to Comments 36.100 and 14.016.	10. CECs and Attachment A
36.105	*Lack of Guidance on Interpretation and Communication of Data* The DPR Expert Panel made a strong recommendation that interpretative and communication tools be developed before using bioassays in the field, stating, "There needs to be clear descriptions of the meanings that will be attached to positive and negative bioassay results. This issue comes to the fore as the intent is to monitor water intended for human consumption. It must be clear – qualitatively and from a dose-response standpoint – how bioassay results are linked to adverse health outcomes. Before any in vitro bioassay is used in the field for this purpose, guidance should be developed for the appropriate technical interpretation of these data relative to health risk and the communication of the results of each bioassay in light of its specific application." (DPR Expert Panel Report, p. 132). ***Such guidance does not exist and needs to be developed prior to full roll out of bioassays, to prevent potential***	The use of ER-α and AhR can increase public confidence in recycled water as they will assure the public that the recycled water producers are using broad investigatory screening tools to identify unknown estrogenic and dioxin-like CECs in the recycled water. See responses to Comments 6.006, 8.018, and 8.020 regarding the timing of the phased monitoring and response actions and Comments 8.016 and 8.022 regarding concerns with data interpretation.	10. CECs and Attachment A

No.	Comment	Response	Categories
	unwarranted concerns about the quality of recycled water.		
36.106	*Formation of an Advisory Group* The CEC Expert Panel recommended formation of a bioanalytical advisory group consisting of select CEC Expert Panel members, CEC Stakeholder Advisory Group members, bioanalytical application experts, State Water Board staff, and representatives from commercial laboratories (CEC Expert Panel Report, p. 81). The purpose of the group would be to define goals for bioanalytical monitoring; specify protocols for sampling, extraction, measurement, and data reporting; and provide guidance for interpretation of bioanalytical monitoring results, including QA/QC data. The group would also interact with on-going and future efforts to develop, evaluate, and apply bioanalytical tools for water quality screening.	See responses to Comments 8.016, 8.022, and 8.031.	10. CECs and Attachment A
36.107	The Sanitation Districts believe that formation of such an advisory group is critical to successful implementation of bioassays as a tool for assessing recycled water. It will ensure that State Water Board has access to a broad spectrum of knowledge and experience as it moves forward, rather than relying solely on limited internal resources for decision making. The Proposed Policy makes no mention of formation of an advisory group. At the Bioassay Workshop, State Water Board staff indicated that they support formation of such a group, but that they did not want to put formation of the group into the Proposed Policy in order to maintain maximum flexibility regarding its formation. The Sanitation Districts are concerned that if the advisory group is not included in the Proposed Policy that it may not be formed. ***We strongly support specific mention of the formation of an advisory***	See responses to Comments 8.016 and 8.031.	10. CECs and Attachment A

No.	Comment	Response	Categories
	group in the policy, or at minimum formation of the advisory group should be mentioned in the adopting resolution for the Proposed Policy. Details regarding the current vision of how the group would work and who it would include could be discussed in the Staff Report rather than the Proposed Policy or adopting resolution, so that flexibility on these details could be retained.		
36.108	*Monitoring Trigger Levels are Regulatory in Nature* The DPR Expert Panel cautioned against establishment of trigger values because they could inadvertently become real standards, stating, "The Expert Panel considered a broad range of data, addressing not only the capabilities of bioassays, but also requirements that would arise either as dictated by regulations or as rules that are considered in the routine monitoring of DPR unit processes and final product water. This need is absolute if these tools are to be employed in compliance monitoring. The Expert Panel cautions that any monitoring related to screening-type trigger values could still inappropriately and/or inadvertently become real standards even if they are not linked to risk and become industry practice." (DPR Expert Panel Report, p. 132). ***The Sanitation Districts support this viewpoint.***	The Amendment makes it clear that monitoring trigger levels are not water quality standards, and if the State Water Board or a regional water board proposed a monitoring trigger level as a water quality objective, there would be a public process and a scientific peer review to adopt such an objective. See response to Comment 10.014.	10. CECs and Attachment A
36.109	In conclusion, the Sanitation Districts believe that a number of changes are needed to the Proposed Policy before it is brought to the Board for adoption. We thank you for the opportunity to comment on Proposed Policy and look forward to providing additional input as the revisions to the Recycled Water Policy move forward.	This is the concluding statement of the comment letter, preceded by Comments 36.001 to 36.108.	12. General Comment
37	**Santa Ana Watershed Project Authority** **Commenter: Mark Norton**		

No.	Comment	Response	Categories
37.001	Many of the new obligations set forth in the proposed amendment to the Recycled Water Policy are things that the Task Force has been doing for more than 12 years and our comments are based on this prior experience.	This is the introductory statement to the comment letter, followed by Comments 37.002 to 37.014.	12. General Comment
37.002	As presently written it appears that the proposed amendments are intended to apply primarily to "projects" that deliberately recharge recycled water to groundwater. It is not clear if or how the new requirements might apply to the incidental recharge that occurs through the streambed when recycled water is discharged to surface waters. Is "incidental streambed recharge" considered a "planned use" or "recycled water project?"	Incidental streambed discharge is not considered a groundwater recharge project because it does not fit the definition given in Water Code section 13561(c), which is referenced in the definition of the term “groundwater recharge” given in the Definitions section of the Amendment.	14. Definitions
37.003	There are numerous instances throughout the document where the proposed amendment emphasizes the need to demonstrate compliance with Title-22. We assume that these statements are referring to the specific regulations within Title-22 governing the use of recycled water and not the other sub-sections of Title-22 that address requirements related to drinking water (e.g.§64449-Table B re: Secondary Maximum Contaminant Levels for Salinity). The Central Valley Regional Board's recent experience adopting a Salt and Nitrate Management Plan demonstrates how complicated this issue can become. Similar statewide confusion can be avoided by revising the Title-22 references to be more specific.	References to California Code of Regulations, title 22 in the Amendment generally refer to the Uniform Statewide Recycling Criteria in CCR, title 22, Div. 4, Ch.3. and are stated as such in the Definitions section. Recycled water projects must be permitted in compliance with all applicable federal and state laws and regulations, and the regional water boards determine which federal and state laws and regulations are applicable when issuing a permit.	14. Definitions
37.004	The proposed amendment is somewhat unclear as to whether or not reclaimed water users presently covered under a Master Reclamation Permit (MRP) should seek coverage under the State Boards General Order WQ-2016-0068-DDW. Section 7.2.1 states that: "... all appropriate and eligible projects with the capability of taking on responsibility of administering water recycling programs shall enroll	See response to Comment 7.009.	7. Permitting for Non-potable

No.	Comment	Response	Categories
	under statewide reclamation requirements." And, Section 7.3.1 states that: "If a project is not appropriate or eligible to enroll under statewide water reclamation requirements, the regional water board shall consider a new site-specific order for adoption or consider the project for enrollment under an existing order (e.g., a master recycling permit..." This language appears to indicate the State Board's preference that recycled water users not rely on a MRP unless they are ineligible to enroll under General Order No. WQ-2016- 0068-DDW. However, Section 1.4 states that the Policy describes the circumstances under which permittees may enroll under Order WQ-2016-0068-DDW "or choose an alternate permitting mechanism such as a master recycling permit." This latter language suggests a discretionary choice between equally acceptable approaches. Are recycled water users who are currently authorized under an existing MRP required to enroll in the statewide General Order when they are eligible to do so?		
37.005	Section 3.2.1.3 requires municipal POTWs to report the volume of treated wastewater discharged to inland surface waters and to specify the "volume required to maintain minimum instream flow." The policy does not provide any definition for what constitutes "minimum instream flow" nor does it describe the method for making such a determination. Is this provision meant to apply only where the Regional Water Board has already proscribed minimum instream flow requirements (e.g. like those established in the North Coast region) or does this provision establish a new obligation on Regional Boards to develop minimum instream flow requirements for all streams that where recycled water is discharged?	Section 3.2 of the Amendment does not give regional water boards new obligations to develop minimum instream flow requirements for streams where recycled water is discharged. It is meant to apply only in circumstances where minimum instream flow requirements have already been established.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
37.006	Section 5.2 of the proposed amendment states that: "To approve a wastewater change petition, the State Water Board must determine that the proposed change will not injure any other legal user of the water involved...." The term "legal user" is not defined by the revised Policy and it is unclear whether it is intended to be synonymous with a duly authorized water right holders or all designated beneficial uses downstream of the discharge. For example, persons engaged in primary contact recreation may be engaged in a legal beneficial use but that does not establish an entitlement to the water in order to continue doing so. As presently written, the Policy appears to create a strong legal presumption in favor of the beneficial uses currently supported by the discharge of recycled water (e.g. REC1 or WARM) thereby making it more difficult to divert such flows to other beneficial uses (e.g. GWR or AGR) in order to address critical water supply and sustainability issues in the state. We recommend this language be revised to provide the Regional Board and State Board greater flexibility to balance the demands of competing beneficial uses.	Section 2 of the Amendment clearly supports use of recycled water as a beneficial use. The term “legal users of water” has the same meaning as in chapter 10 of part 2 of division 2 of the Water Code.	5. 1211 and WW Change Petitions
37.007	Sections 6.1.3 and 6.2.1.1 require Regional Water Boards to develop a management plan for all groundwater "basins where salts and/or nutrients are a threat to water quality." It is unclear whether this obligation is triggered only when pollutant concentrations may exceed applicable water quality objectives or if a SNMP must also be developed anywhere that recycled water recharges may "degrade" existing groundwater quality even if salt and nitrate concentrations in the receiving water remain well below basin plan objectives. Since the text of section 8.2.4.1 suggests that some portion of the available assimilative capacity may be used without undue concern, it does not appear that all potential degradation automatically constitutes "a threat to water	Permitting of a recycled water project that has the potential to degrade a high-quality water does not trigger the need for an SNMP in the basin/subbasin. Rather, potential groundwater impacts associated with a recycled water project are to be evaluated through the permitting process, including the associated antidegradation evaluation. However, a regional water board may require development of SNMP as a condition of permitting a recycled water project. One of the objectives of the basin categorization in section 6.1.3 of the Amendment is to inform this process. The categorization of a basin as being high threat or low threat with respect to salts and nutrients should inform regional water board staff as to whether development or participation in development of an SNMP should be included as a permit condition. Section 6.1.3 of the	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	quality" nor is a SNMP automatically required in order to make any allocation of assimilative capacity. Additional text would be useful to help clarify what constitutes a threat to water quality sufficiently serious to warrant development of a SNMP.	Amendment also includes factors the regional water boards must consider in evaluating potential threat to water quality from salts and nutrients, such as the magnitude of and trends in the concentrations of salts and nutrients in groundwater, contribution of imported water and recycled water to the basin water supply, reliance on groundwater to supply the basin or subbasin, population, etc. The regional water board will evaluate each basin for these as well as any additional region-specific factors to determine whether development of a salt and nutrient management plan is necessary to achieve water quality objectives in the long-term.	
37.008	Section 6.2.4.1 specifies that water quality monitoring plans "must focus on water supply wells and areas proximate to large water recycling projects, particularly groundwater recharge projects." Since all wells supply water it appears that this section was actually intended to emphasize the need to focus on wells used for domestic and community drinking water uses (MUN). If so, additional language clarifying this intent would be helpful.	Since the purpose of the SNMP is ultimately protection of beneficial uses, the monitoring program should not be restricted to wells used for domestic and community drinking water uses and could include industrial and agricultural water supply wells. The reference to water supply wells is intended to distinguish these wells from groundwater monitoring wells.	6. Salt and nutrient management plans
37.009	Section 8.2.4.1 retains the language from the existing Recycled Water Policy that describes how assimilative capacity should be calculated by comparing the mineral water quality objective with the average water quality concentration in the basin or sub basin. The Santa Ana Regional Board has been using this approach for more than 40 years and it was specifically affirmed by the State Board in Res. No. 2004-0060 approving the SNMP for that region. However, when the Central Valley Regional Board recently proposed to adopt the same approach in their SNMP, several stakeholders submitted comments stating that such "spatial and temporal averaging" was not allowed by the California Water Code and was inconsistent with the state Antidegradation Policy (Res. No. 68-16). This same concern arose in 2015 when the State	See response to Comment 13.013. Section 8.2.4.1 of the Amendment was revised to state that assimilative capacity shall be calculated by comparing the mineral water quality objective with the representative concentration of the basin or subbasin, as determined by the regional water board.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	Board staff published a white paper discussing potential revisions to the Antidegradation Policy. It would be very helpful if Section 8.2.4.1 were expanded to more fully describe appropriate application of spatial and temporal averaging techniques in the context of evaluating compliance with water quality objectives for groundwater basins/sub-basins.		
37.010	Section 6.2.4.1.3 requires monitoring data to be reported electronically to a database and in a format specified by the State Water Board. While we have no objection to such a requirement we wish to note that we have had extreme difficulty working with some state databases (esp. CEDEN). The input specifications are so rigid and inflexible that we have been unable to complete a successful upload despite considerable effort. The smallest deviation or omission will cause otherwise valid data to be rejected. This problem must be resolved before imposing new electronic submission requirements.	Salt and nutrient management data are currently reported in GeoTracker, not CEDEN. Section 6.2.4.1.3 was modified to require data generated from salt and nutrient management plans to be reported electronically to the Groundwater Ambient Monitoring and Assessment (GAMA) information system or its successor.	3. Goals, mandates, and reporting requirements
37.011	Sections 7.3.2.1 and 7.3.2.1.5 require recycled water projects to demonstrate "appropriate use of fertilizers" in order to be eligible for streamlined permitting. This appears to establish a new reporting obligation regarding the amount of fertilizer used in areas where recycled water is also applied. This would impose an enormous additional burden on recycled water agencies that may inadvertently discourage the use of reclaimed water for landscape or crop irrigation.	See response to Comment 4.012. Section 7.4 was added to the Amendment to restrict the regional water board from imposing project-specific groundwater monitoring requirements for non-potable recycled water projects if certain criteria are met, and excluding unique, site-specific conditions. One of the criteria is appropriate use of fertilizers that accounts for the nutrient levels in the recycled water and nutrient demand by plants. See also Comment 5.002.	7. Permitting for Non-potable
37.012	In addition, the proposed policy provides no guidance as to what constitutes an "appropriate use of fertilizers" or how to make such a determination.	Section 7.4 of the Amendment requires appropriate use of fertilizers that takes into account nutrient levels in recycled water and nutrient demand by plants as a criterion that must be met for the regional water board to be prohibited from requiring project-specific groundwater monitoring. As such, the use of fertilizers should minimize impacts of nutrients to groundwater quality in order to justify the restriction of the regional water board to impose project-	7. Permitting for Non-potable

No.	Comment	Response	Categories
		specific groundwater monitoring. The regional water boards will determine the appropriate use of fertilizers for the applicable use(s) of recycled water on a project-specific basis.	
37.013	Section 8.2.4.1 appears to indicate that groundwater recharge projects that propose to utilize less than 10% of available assimilative capacity alone, or less than 20% of available assimilative capacity in combination with multiple projects in the same basin, need not conduct any additional analysis in order to comply with the Antidegradation Policy provided that the project proponent is actively participating in the development of a salt and nitrate management plan for the basin. How does this language affect other provisions of the Antidegradation Policy to demonstrate: 1) no pollution or nuisance, 2) best practicable treatment or control, and 3) maximum benefit to the people of the state?	Section 8.2.4. states that compliance with the Antidegradation Policy may be demonstrated as follows in 8.2.4.1 and 8.2.4.2. Section 8.2.4.1 states that "the antidegradation analysis need only demonstrate that the project will use less than 10 percent (or multiple projects will use less than 20 percent) of the available assimilative capacity [of the basin]." Therefore, a groundwater recharge project utilizing the fraction of assimilative capacity as determined per 8.2.4.1 need not conduct additional analyses, such as demonstration of 1) no pollution or nuisance, 2) best practicable treatment or control, and 3) maximum benefit to the people of the state. However, the requirement that the project use less than 10 or 20 percent of the assimilative capacity will ensure that pollution will not occur.	8. Permitting for GWR
37.014	Section 7.4 establishes rigid prohibitions against allowing recycled water to escape from proscribed use areas. The proposed text establishes a strict liability standard that would apply even to something as simple as a broken sprinkler head while making no allowance for good faith efforts to affect timely repairs when such events occur. Such language may actually discourage greater use of recycled water because it inadvertently reinforces the long-held public misperception that recycled water is dangerous. We urge the State Board to consider revising this text to require authorized users to make best efforts to minimize the risk of recycled water escaping the designated use areas.	In response to the comment, section 7.5 of the Amendment was modified to state that incidental runoff of recycled water shall not result in water quality less than that prescribed in water quality control plans or policies. This ensures that in the event of small amounts of discharge leaving the use area, the recycled water project is prohibited from impacting beneficial uses. See also response to Comment 25.014.	7. Permitting for Non-potable
38	**Santa Clara Valley Water District** **Commenter: Norma Camacho**		

No.	Comment	Response	Categories
38.001	The District appreciates the efforts of the Water Board to prepare the draft Amendment in the interest of improving public and environmental safety and standardizing the State's regulation of recycled water. The District is generally supportive of the overall intent of the Amendment and views it as a positive step towards expanding water recycling and potable reuse in California.	This is an introductory statement to the comment letter followed by comments 38.003 to 38.010.	12. General Comment
38.002	The District offers the following comments and recommendations for the Water Board's consideration: 1. The District supports the goals identified in Section 3.1 of the proposed Amendment, which promote increased use of recycled water in California and strive to minimize discharges to coastal waters while maintaining beneficial uses. This goal supports the 1972 Clean Water Act to restore and maintain the chemical, physical and biological integrity of the Nation's waters and eliminate discharge of pollutants to navigable waters.	Commenter supports the goals; no change is requested.	3. Goals, mandates, and reporting requirements
38.003	2. The District commends the Water Board for proposing to improve the management of recycled and potable water facility monitoring data by creating a unified reporting system and database. A centralized database could eliminate duplicative efforts, standardize reporting, and easily share information for the benefit of water utilities, industry, and the public at large. To streamline analysis and optimize data requests, the collected information should be easily accessible.	See responses to Comments 1.037 and 11.003.	3. Goals, mandates, and reporting requirements
38.004	3. Under Attachment A amendments, Recycled Water Project Proponents (RWPP) are required to monitor for constituents of emerging concern (CEC). For most CECs listed in Attachment A there are no lists of approved methods nor of accredited laboratories. The District is concerned about identifying cost-effective means to conduct tests and validate results under the	See response to Comment 1.046.	10. CECs and Attachment A

No.	Comment	Response	Categories
	guidelines laid out in the Amendment. In the interest of consistency, the District promotes alignment with ELAP, rather than The NELAC Institute (TNI) standards, including exceptions included in Attachment A, and the exception in ELAP's preliminary draft regulations which relaxes the laboratory proficiency testing requirement from twice per year to once per year.		
38.005	4. CEC monitoring will be an evolving challenge into the future, and bioanalytical assays are a potentially invaluable tool for protecting public health due to their ability to capture the multiplicative biological effects of mixtures of CECs, and various un-monitored contaminants and disinfection byproducts.	Comment noted. This is a statement and no response is needed.	10. CECs and Attachment A
38.006	The District supports implementing bioanalytical screening tools but considers it premature to establish action levels and response actions based upon the results of these tests at this time. Bio-analytical tools are still in the initial stages of development, and do not yet have certifiable or standardized protocols. The District promotes a phased adoption of bioanalytical assays where preliminary phases would include establishing testing protocols and lab certification requirements as recommended by the Science Advisory Panel for Recycled Water's report on *Monitoring Strategies for CECs in Recycled Water.*	See responses to Comments 1.049, 8.003, 8.018, 8.020, 10.009, and 10.014.	10. CECs and Attachment A
38.007	5. The District appreciates the Amendment's recognition of the potential overlap between Salt and Nutrient Management Plan and Sustainable Groundwater Management Act requirements. Similarly, we recommend that the Amendment align with related components of the Division of Drinking Water Indirect Potable Reuse (IPR) regulations or allow for functional equivalence. For example, the Amendment requires groundwater monitoring at the 30-day travel time, but the IPR regulations are more flexible in allowing the	See response to Comment 26.022.	10. CECs and Attachment A

No.	Comment	Response	Categories
	monitoring point to be located between 2 weeks and 6 months travel time.		
38.008	In addition, Table 8 in Attachment A identifies monitoring response actions that are not well-aligned with Division of Drinking Water notification and response levels. For example, CECs like NDMA and 1,4- dioxane could be detected in groundwater far above DDW notification and response levels before consultation with the Regional Water Board and State Board is required under response action (E). The District recommends that response actions in the Amendment be better aligned with DDW response levels to adequately protect the beneficial uses of groundwater.	The following footnote has been added to Table 8 to clarify that, for constituents with notification levels, the response actions may differ from what is specified in Table 8: "If a CEC also has a notification level, additional follow-up monitoring may be required by California Code of Regulation, title 22."	10. CECs and Attachment A
38.009	6. The District is concerned with the proposed removal of priority pollutant monitoring requirements for recycled water that is used for landscape irrigation projects. The rationale for removing this requirement is based on risk to human health and aquatic life through direct exposure to recycled water, but it does not consider potential impacts to groundwater. The District has detected priority pollutants including NOMA, perfluorinated compounds, and other priority pollutants in recycled water and groundwater near recycled water irrigation sites. Because of the importance of understanding the prevalence, fate, and transport of these compounds, the District recommends retaining the priority pollutant monitoring requirements in the Amendment.	See response to Comment 23.004.	7. Permitting for Non-potable
38.010	The District acknowledges the Water Board for its tremendous work in developing the regulations necessary to establish safe and effective regulations for recycled water and potable reuse. The District believes recycled and reused water is a safe, reliable, locally-controlled water supply that protects the environment, sustains economic growth, and provides	This is the concluding statement to the comment letter preceded by Comments 38.001 to 38.009..	12. General Comment

No.	Comment	Response	Categories
	resiliency for water resources made more uncertain by climate change.		
39	**South Orange County Wastewater Authority** **Commenter: Amber Baylor**		
39.001	The South Orange County Wastewater Authority (SOCWA) is a ten-member joint powers authority serving approximately 500,000 people in South Orange County. SOCWA supports the State Water Resources Control Board's (State Water Board's) efforts to amend the existing Recycled Water Policy. Expansion of recycled water is an important component of diversified, local supplies in South Orange County. The draft Policy for Water Quality Control for Recycled Water (Proposed Policy) contains many provisions that will enable water utilities in the SOCWA service area to transition the existing recycled water supplies into direct potable reuse for reservoir supply augmentation in a safe an effective manner. The proposed policy has many updates that are beneficial to SOCWA and member agencies. SOCWA appreciates the removal of a unenforceable mandate on the total amount of recycled water usage in California, adding language stating that the regional boards are to use their authority to the fullest extent possible to streamline permitting of recycled water projects, remove the requirement for all irrigation projects to have an operations and maintenance plan (instead allowing regional board discretion on this issue), allowing groundwater recharge projects to comply with the Antidegradation Policy by demonstrating that their project is consistent with an adopted SNMP, removal of required management practices associated with controlling and limiting incidental runoff, and removal of required priority pollutant monitoring for non-potable reuse projects.	This is the introductory statement to the comment letter, followed by Comments 39.002 to 39.019. The commenter supports Amendment language relating to removing the mandates, streamlining recycled water permitting by regional water boards, removing operations and maintenance plan requirements for landscape irrigation recycled water projects, addressing antidegradation requirements for groundwater recharge projects, removing incidental runoff requirements, and removing priority pollutant monitoring requirements for non-potable projects; no change is requested.	12. General Comment

No.	Comment	Response	Categories
	However, it appears that other provisions of the Proposed Policy will increase the regulatory burden on recycled water and result in delays and increased costs associated with recycled water projects. SOCWA's concerns are focused on (1) reducing duplicative monitoring requirements for recycled water and SNMP monitoring reporting and (2) consistency with State-wide efforts related to development of a California quality management system as required in AB 1438.		
39.002	The original Recycled Water Policy was adopted in 2009 with the purpose of increasing the use of recycled water from municipal wastewater sources. It appears that the Proposed Policy is heading in a different direction, and its purpose would no longer be to increase usage of recycled water. Rather, the focus seems to be on increasing the safety of recycled water and to provide direction to various parties on permitting of recycled water projects. This change in the purpose of the policy is not warranted. It continues to be essential to expand recycled water usage, as the concerns outlined in the Preamble of the original Recycled Water Policy are still valid (e.g., the Bay Delta ecosystem, climate change, population growth, droughts, etc.). Additionally, it is unclear why there appears to be a focus on increasing the safety of recycled water in California, which has not been an issue over the entirety of its use in California. This is especially true in South Orange County where agencies have been recycling water over the last 40 years without any adverse health effects.	See response to Comment 36.004.	1. Purpose

No.	Comment	Response	Categories
39.003	This change in focus is reflected in the proposed title for the policy, which would be amended from "Recycled Water Policy" to "Policy for Water Quality Control for Recycled Water." We request that the original title be retained, to reflect that the purpose of the Policy is to broadly facilitate use of recycled water and not just to control its quality.	See response to Comment 36.004.	1. Purpose
39.004	We also request that the stated purpose of the Policy be reinstated to the purpose in the original Recycled Water Policy, i.e. "The purpose of this Policy is to increase the use of recycled water from municipal wastewater sources…".	See response to Comment 36.004.	1. Purpose
39.005	The Proposed Policy includes definitions for enclosed bays, estuaries and coastal lagoons, and ocean waters. These terms have already been defined by the State Water Board in documents such as the Policy for Implementation of Toxic Standards for Inland Surface Water, Enclosed Bays, and Estuaries of California. In addition, the definitions should include reference to elements of a consistent, approved, quality assurance systems that are consistent with systems used at the SWRCB and the EPA as referenced in Attachment A. To avoid confusion or inconsistencies, it is recommended that definitions for these terms not be included in the Proposed Policy, but instead a reference be made to where definitions can be found.	A change was made to the Definitions section of the Amendment to add a definition for quality assurance project plan (QAPP), to avoid confusion and inconsistencies over what a QAPP is. See also response to Comment 36.007.	14. Definitions
39.006	Section 1.5 of the Proposed Policy addresses the State Water Board's intent regarding statewide consistency in recycled water permitting. The language in the Proposed Policy is weaker regarding statewide consistency than the language in the original Recycled Water Policy. The original Recycled Water Policy stated intent was to "maximize" consistency, while the proposed language stated intent is to only "promote" consistency. SOCWA believe that statewide	See response to Comment 36.006.	1. Purpose

No.	Comment	Response	Categories
	consistency is essential to promoting increased use of recycled water, and requests that language to "maximize" consistency continue to be used in the Policy.		
39.007	This is especially important when considering the public's acceptance of recycled water for the various uses outlined. Recycled water in San Diego should be of the same quality as recycled water in Sacramento.	This comment is linked to Comment 39.006; see response to Comment 39.006.	12. General Comment
39.008	SOCWA supports the State Water Board's efforts to develop more usable and accessible data regarding recycled water usage. To comply with its recycled water permit requirements, SOCWA has always provided information on recycled water usage, both to individual sites and through discrete distribution systems to the San Diego Regional Water Quality Control Board. Developing a process to compile information on recycled water usage statewide will greatly enhance the ability of the State Water Board to understand and communicate the status of recycled water usage across the state.	The commenter supports Amendment language relating to the reporting requirements; no change is requested.	12. General Comment
39.009	However, we have some concerns about the reporting requirements as they are currently proposed. First, we feel that it is critical to avoid duplicate reporting of extensive amounts of data. SOCWA already reports all of the information required under Section 3.2 on a monthly, quarterly basis, or annual basis depending on the treatment plant. We therefore support the language on pages 45-46 of the Staff Report that call for the reporting in the Proposed Policy to replace existing regional water board reporting requirements. Additionally, while Section 3.2 calls for reporting on a monthly basis, submittal of reports should not be required at more than a quarterly frequency. Combining of three months of data into one quarterly report will save resources on the part of recycled water producers to prepare the reports, and resources on the part of the water boards to review the reports. It does	See responses to Comments 1.037, 2.100, and 36.028.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	not appear that there is an urgent need for the data and therefore it shouldn't not be required to be submitted on a monthly basis. Second, the requirement for municipal wastewater treatment plants to report plant influent flows should be removed. Production of recycled water will be quantified directly, so reporting of influent flows will not provide any useful information. Some municipal wastewater treatment plants are not able to measure influent flows due to their configurations. In addition, the water reclamation plants in the SOCWA service area already report influent flow data that is contained in the California Integrated Water Quality System (CIWQS). Duplicative reporting is inefficient therefore SOCWA requests the removal of this requirement.		
39.010	SOCWA is a leader in the development and maintenance of salt and nutrient management plans (SNMPs) and appreciate the SWRCB's efforts in formalizing many of the aspects of SNMP used as a technical tool in management of ground water basins. There are however a few concerns that we would like addressed.	This is an introductory statement to the commenter's discussion of SNMPs, followed by Comments 39.011 to 39.013.	12. General Comment
39.011	The existing Recycled Water Policy states that the "preferred approach to monitoring plan development" is to collect samples from existing wells to the extent feasible. The Proposed Policy, at Section 6.2.4.1.2, would remove use of existing monitoring wells as a "preferred approach" and simply state that use of such wells is allowed. This may be problematic, because use of existing wells provides the most cost-effective means of monitoring the ground water basins. Retaining this verbiage could possibly avoid an arbitrary expensive and time-consuming requirement to construct new wells. This will help contain costs associated to the preparation of SNMPs which is critical as this unfunded mandate to produce these	See response to Comment 36.044. Preparation of SNMPs is a voluntary, collaborative process and not an unfunded mandate. See response to Comment 35.006.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	documents typically do not have an identified funding source for preparing and/or maintaining the plans.		
39.012	The Proposed Policy, at Section 6.2.4.1.3, would increase the reporting frequency of SNMP data from every three years to annually, and would require electronic reporting "to a database identified by the regional board". If the regional boards will only be assessing the data every 5 or 10 years, it is not clear why reporting needs to be conducted annually, instead of every three years.	See response to Comment 34.049. The five-year timeframe refers to the formal, comprehensive review of the basin, including the conceptual model (e.g., trends, total loading, etc.) included in the SNMP. The annual submittal of data is to allow for more frequent reviews of trends in certain areas of a basin that may be of concern.	6. Salt and nutrient management plans
39.013	In addition, the database identified in the Policy (e.g. GeoTracker) does not have the level of sophistication to handle the extensive water quality data points needed to understand cumulative impacts to sub-watersheds overlying groundwater basins in California. The SNMPs exist as technical documents to assess impact and inclusion in additional databases would dilute the ability for meaningful reference. Therefore, SOCWA requests the "e.g., GeoTracker" reference be removed from the Proposed Policy.	See response to Comment 34.049. Cumulative, non-point source data should be evaluated on a basin/subbasin-wide scale. Including data in a spatial database does not conflict with that goal. The GAMA database tools allow users to download data based on the selected area of interest for data analysis.	6. Salt and nutrient management plans
39.014	Section 1 of Attachment A of the Proposed Policy specifies quality assurance/quality control (QA/QC) measures that must be established for a laboratory to undertake constituent of emerging concern (CEC) monitoring, including bioanalytical screening. The QA/QC system exists not only in the laboratory but more broadly in the sample collection process. Attachment A should refocus this broader perspective in alignment with State objectives and existing quality management strategies.	See responses to Comments 1.046 and 1.049.	10. CECs and Attachment A
39.015	The introductory language to Section 1 of Attachment A requires submission and approval of a quality assurance project plan (QAPP) prior to beginning any sampling and analysis. We applaud the State Boards effort in this areas as the QAPP connects sample collection to results in meaningful ways.	The commenter is in support of the requirement in Attachment A for submission and approval of a quality assurance project plan (QAPP); no change is requested.	10. CECs and Attachment A

No.	Comment	Response	Categories
39.016	However, there are several different QAPP templates available, including ones developed by the U.S. EPA, the Surface Water Ambient Monitoring Program (SWAMP), and the State Water Board's Office of Information Management and Analysis. It would be helpful if the Staff Report would include a list of required QAPP elements and/or include a list of which QAPP templates are acceptable.	See responses to Comments 1.046 and 1.049.	10. CECs and Attachment A
39.017	Attachment A, Section 1.1 requires use of the National Environmental Laboratory Accreditation Conference Institute (TNI), 2016 Standard to demonstrate that an adequate quality management system is in place. However, the Proposed Policy does not specify what documentation needs to be maintained to demonstrate compliance with the TNI requirements.	See response to Comment 1.046.	10. CECs and Attachment A
39.018	Additionally, the 2016 TNI standard has not yet been implemented by TNI. Instead, the 2009 Standard is currently being used by TNI. The Proposed Policy should therefore strike the reference to TNI because (1) full TNI accreditation is not proposed in the California Environmental Laboratory Accreditation Program (ELAP) regulation, (2) ELAP does not have the ability to certify bioassay methodologies, and (3) the four laboratories that can complete the bioassay testing currently are certified through ISO/IEC 17025 certification not the TNI standard.	See response to Comment 1.046.	10. CECs and Attachment A
39.019	We recommend that State Board staff develop quality management plans that are consistent with other efforts currently being undertaken at the State level as reference above in compliance with AB 1438, the foundational legal framework that governs ELAP.	See response to Comment 1.046.	10. CECs and Attachment A
40	**Southern California Alliance of POTWs (SCAP)** **Commenter: Steve Jepsen**		
40.001	SCAP seeks cost-effective and attainable regulations that are stakeholder driven for the best protection of public health and the environment.	This is an introductory statement followed by comments 40.001 to 40.002.	12. General Comment

No.	Comment	Response	Categories
40.002	We strongly recommend removing the references to The NELAC Institute or TNI in the definitions section and in Attachment A. At the southern California workshop hosted by the Southern California Coastal Water Research Project on June 11, 2018 State Board staff acknowledged that ELAP would unlikely be ready to certify any bioanalytical protocols referenced in Attachment A and that ELAP is still working on draft regulations that have not been fully adopted. For laboratories that are ready to use the bioanalytical assays referenced in Attachment A, those laboratories are using ISO 17025 not TNI. As such, the requirement to use TNI is not consistent with what is available in the near term for those laboratories to analyze data for CECs in Attachment A. Additionally, TNI has only fully adopted the 2009 TNI standard so reference to the 2016 standard will create unnecessary confusion. Inclusion of TNI by reference is not mature enough for incorporation in this important proposed Policy.	See response to Comment 1.046.	10. CECs and Attachment A
40.003	Finally, in reference to the requirement for the submission of a Quality Assurance Project Plan or QAPP. We believe that this is an important component of quality assurance linking field collection with laboratory analysis and we applaud this requirement for a QAPP. However, QAPPs have been developed by the Surface Water Ambient Monitoring Program (SWAMP), the State Boards Office of Information Management, and the EPA. Inclusion by reference to the significant work already developed will provide guidance and templates that can be instantly utilized.	See responses to Comments 1.046 and 1.049.	10. CECs and Attachment A

No.	Comment	Response	Categories
40.004	To summarize, replacement of TNI with reference to accreditation standards in compliance with AB 1438, the law governing ELAP's accreditation standards in combination with reference to the extensive literature on existing QAPPs can only strengthen this Proposed Policy.	See responses to Comments 1.046 and 1.049.	10. CECs and Attachment A
41	**WaterReuse California - Jennifer West** **CASA - Roberta Larson** **ACWA - Adam Borchard** **CUWA - Cindy Paulson** **CMUA - Jonathan Young**		
41.001	On behalf of WateReuse California (WRCA), the California Association of Sanitation Agencies (CASA), California Municipal Utilities Association (CMUA), the Association of California Water Agencies (ACWA) and California Urban Water Agencies (CUWA), we thank you for the opportunity to submit comments on the draft amendments to the Recycled Water Policy (Policy). To stretch California's limited water supplies, our organizations support maximizing the beneficial use of recycled water in California, whether it be for drinking water, or for non- potable applications, such as for landscape irrigation, agriculture or other purposes. We appreciate the time and effort spent developing the revised Policy. While we support many of the changes, our members have identified several aspects of the draft that are of significant concern. Our comments below are intended to ensure that the Policy continues to encourage and enhance, rather than unnecessarily impede, future recycled water project development, as well as support the continued implementation of existing projects. Given the importance of these issues, we request that the Board take the time	This is an introductory statement to Comments 41.002 to 41.023; no change is requested.	12. General Comment

No.	Comment	Response	Categories
	necessary to complete the Policy in a thoughtful and collaborative manner. In particular, given the significant concerns we continue to have about the Bioassay Monitoring provisions, we request that the Board postpone initiation of the peer review process until we have an opportunity to work with staff to try to reach consensus.		
41.002	**Maintain a Singular Goal of Increasing Recycled Water Statewide** Appropriately, the one goal of the current Policy is to increase water recycling in California. All of the actions within the Policy are intended to support this broad goal, which is also contained in the California Water Code, Section 13560. The draft Policy would add another parallel goal: <u>Minimize the direct discharge of treated municipal wastewater to enclosed bays, estuaries and coastal lagoons, and ocean waters, except where necessary to maintain beneficial uses. For the purpose of this goal, treated municipal wastewater does not include brine discharges from recycled water facilities or desalination facilities.</u> Our associations do not support the inclusion of this new goal. First, we view minimizing wastewater discharges only to the ocean and bays as a way to increase awareness of water recycling focused solely in coastal areas – not a statewide goal in and of itself. We support the Board's desire to analyze information that wastewater agencies report to the Board regarding the amount of wastewater discharged to the ocean and bays. This information can be used to assess how much water recycling is theoretically possible to reduce wastewater discharges to saline water bodies, but to make such an assessment useful, it must take into	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
	account a variety of factors including demand, costs, feasibility, brine management, service duplication restrictions, and potential permitting issues.		
41.003	Additionally, by elevating this concept to a Policy goal, the Board would be sending a message that recycling in inland areas for agriculture and other purposes is a lower priority than coastal recycling and provide a platform for those who say water recycling should not occur unless the wastewater would otherwise flow to a saline water body. We must respectfully disagree with this principle. If the Board determines this concept must be retained in the Policy in some form, we ask that it be moved to the "Benefits" section of the Policy and be recast to encourage water recycling where wastewater is discharged to the ocean/bays/estuaries. We would be happy to work with your staff on appropriate language.	See response to Comments 1.002.	3. Goals, mandates, and reporting requirements
41.004	The Board should also consider expanding the Benefits section to include other major opportunities to increase water recycling in California, such as encouraging the use of recycled water for agriculture in inland areas and the benefits of increasing recycled water use as a strategy for adapting to climate change.	See response to Comment 34.005.	2. Benefits of recycled water
41.005	We also request that the language in Section 3.2 about calling for the Board to establish mandates to achieve the goals in section 3.1 be deleted.	See response to Comment 36.012. Amendment is revised consistent with this comment.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
41.006	**Annual Recycled Water Reporting** We are generally supportive of the annual recycled water reporting requirements included in the Policy. However, we ask that all other duplicative tracking of recycled water uses be discontinued. We understand that the Board may not have full control over other state agencies conducting the recycled water tracking so the Board may want to include a statement in the Policy that this reporting is intended to be the sole way to track recycled water use in the state.	See responses to Comments 1.037 and 11.003.	3. Goals, mandates, and reporting requirements
41.007	Additionally, we request that the monthly reporting for municipal wastewater treatment plant influent, production and disposal be modified to require reporting of quarterly data in an annual report at one time per year instead of setting a monthly report schedule.	See response to Comment 2.100. The Amendment is revised to require annual reporting of monthly data.	3. Goals, mandates, and reporting requirements
41.008	Further we ask that Section 3.2.1 expressly recognize that the volume of influent entering a wastewater treatment plan will not equal the volume of treated wastewater produced.	See response to Comment 1.041.	3. Goals, mandates, and reporting requirements
41.009	**Restore Funding Incentives** As California continues to develop recycled water projects, it is critical that the Board make grants and loans available to provide an opportunity for smaller utilities to retrofit existing plants, when appropriate, to support water reuse applications, or build small-scale demonstration projects for producing recycled water. The 2009/2013 Recycled Water Policy provided funding incentives for water purveyors, stormwater agencies, and water recyclers. However, the proposed amendments to the 2018 Recycled Water Policy omit the funding provisions. We recommend that the Board retain funding incentives within the proposed policy to further the development of local water infrastructure projects and advance research for new, innovative technologies.	See response to Comment 1.008.	12. General Comment

No.	Comment	Response	Categories
41.010	**Wastewater Change Petitions** Over the last few years wastewater change petition requirements in Water Code Section 1211 have delayed many water recycling projects in California. During the CEQA scoping phase, staff acknowledged this problem and indicated that the proposed changes to this section of the Policy would clarify the institutional and interagency issues and streamline the process. Unfortunately, the proposed changes to the Policy create uncertainty rather than clarity, add new requirements to a process that is already prone to delays, and fail to address the very real institutional, scientific, and resource issues that characterize the current process.	The determination/concurrence step is an important addition for recycled water project proponents to confirm early on whether a change petition is required for a project or program. The State Water Board is open to further discussions with stakeholders to help streamline the concurrence and determination process. Also see the response to Comment 7.006.	5. 1211 and WW Change Petitions
41.011	There are two issues of major concern with this section of the Policy. First, the Policy states that the Division of Water Rights (DWR) may cumulatively consider the impacts from "past, present and probable future projects with the potential to decrease the streamflow." CEQA compliant projects will already have considered cumulative impacts of past and present projects, where applicable, so this provision appears to be duplicative. We understand that in some cases, where there are multiple proposed projects in a watershed, the Board may wish to employ a different approach to ensure instream uses are protected. This does not require a policy amendment; the Board is already taking such an approach with the Los Angeles River pilot project, which provides an opportunity to "test drive" this model. However, we are concerned that the policy as drafted has the potential to further slow down and complicate reviews for the majority of projects where this approach is not needed or appropriate.	While the commenter is correct that a policy amendment is not required for the State Water Board to evaluate cumulative impacts of multiple projects on reducing flows in a water course, the Amendment is a clarification of State Water Board authority and acknowledgment of some of the challenges of balancing increased recycled water use with maintaining adequate instream flows in certain watersheds.	5. 1211 and WW Change Petitions
41.012	Second, Section 5.1 adds a new requirement that prior to changing the point of discharge, place of use, or purpose of use of treated wastewater that **could** decrease the flow in any portion of a watercourse, or	We agree that increased education and outreach regarding the need for Water Code section 1211 compliance will help elevate awareness and compliance with the requirements. However, there have been previous efforts to increase	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
	receiving state funding for the treatment or use of recycled water, a "determination" must be obtained from the Board staff that the project is in compliance with Section 1211. We are concerned that even if the process for a "determination" is set up initially as a simple process (i.e., simple request and an email reply) it has the potential to become more complicated and burdensome over time, with the Board developing extensive forms that have to be completed and expanding the making of any such determination into a complicated and time-consuming process. We understand this requirement may have been prompted by the failure of some applicants to understand and comply with Section 1211. Simply stating the obligation in the Policy will help raise awareness, and we believe that additional education and outreach would also be a useful way to ensure that project proponents understand the requirements of Section 1211. However, requiring issuance of an affirmative determination, as proposed in the Policy, has the potential to create additional delays for those who are compliant, and puts an additional burden on the Board's staff.	awareness, and there is still a great deal of uncertainty by some dischargers as to whether approval is required. Section 5.1 of the Amendment was modified to allow for an optional "self-certification" screening process, subject to concurrence by DWR. In this way, there should be very little, if any, delay in implementation by a recycled water project proponent, in cases where a wastewater change petition is not required. It will also help promote early identification of projects that do require approval and allow ample time for consultation with other agencies and the recycled water project proponent. Also see the response to Comment 7.006.	
41.013	In light of this and other concerns related to Section 1211, we believe that the Board and the recycled water community would be better served by convening a stakeholder/interagency effort to develop a guidance or other document that sets forth the process, obligations, timelines and other important aspects of the program.	DWR is open to future discussions outside of the Amendment process to identify potential opportunities to develop guidance and/or further streamline the wastewater change petition approval process.	5. 1211 and WW Change Petitions

No.	Comment	Response	Categories
41.014	**Salt and Nutrient Management Plans (SNMPs)** We support the change in the Policy that calls for Regional Board prioritization of SNMP development and thank staff for its inclusion. We believe it is important to devote limited resources to addressing those basins where salt and nutrients need to be managed to protect beneficial uses.	The commenter supports Amendment language relating to SNMP prioritization; no change is requested.	6. Salt and nutrient management plans
41.015	We continue to believe that the inclusion of the SNMPs within the Policy is misplaced. The SNMPs should be part of a larger stakeholder effort to manage the quantity and quality of groundwater in California. The passage of the Sustainable Groundwater Management Act (SGMA) in 2014 appears to be an opportunity to coordinate SNMPs with SGMA plans and reduce overlap among separate groundwater/water quality planning efforts.	See responses to Comments 1.026 and 1.027.	6. Salt and nutrient management plans
41.016	**Permitting of Recycled Water Projects** The draft Policy requires that all old engineering reports (before 2000) be reviewed and updated in two years. The draft Policy also states that all recycled water general orders from Regional Boards will expire in one year and agencies must transition to the 2016 General Order or other permit coverage for non-potable recycled water. We are concerned that one year is not enough time to enroll all of the regional board permit holders in the 2016 General Order. If engineering reports need to be reviewed or updated, this could potentially take longer than a year, and recycled water permittees could be left without coverage through no fault of their own. We ask that the deadline be extended, or language included in the Policy allowing projects to continue while the transition is ongoing.	See response to Comments 1.009 and 1.010. Recycled water permits issued prior to January 1, 2001 that are not a regional water board general order must be reviewed within three years from the effective date of the Amendment. See response to Comments 7.009 and 8.046 for an explanation of the regional water boards' ongoing flexibility to select the appropriate permitting mechanism for a recycled water project.	11. Permit review and update

No.	Comment	Response	Categories
41.017	We also note that agencies with existing permits that update their engineering reports and comply with all aspects of the Policy should be allowed to maintain master or individual permit coverage outside of the 2016 General Order.	See response to Comments 7.009 and 8.046.	11. Permit review and update
41.018	**Bioassay Monitoring: Follow CEC Science Advisory Panel Recommendation** While we support the advancement of monitoring through bioassays, we are very concerned about the proposed approach in the Policy. In April the science advisory panel released its final report on CECs -- *Monitoring Strategies for Constituents of Emerging Concern in Recycled Water.* The report made a number of recommendations and observations on bioassay testing. These were: • Two new bioassay tests (ER-a/AhR) should be added for groundwater recharge and reservoir augmentation potable reuse projects. • The bioassay testing should be done in a deliberate three-phase approach that consists of a 3-5 year data collection period, a pilot implementation phase and finally, a full implementation phase with response actions associated with the results of the bioassay tests. • The science advisory panel declared that response actions as a result of these tests in the data collection phase are <u>"premature and thus not appropriate, until such methods are fully validated and certified by the appropriate entities."</u> This statement is made in different ways eight separate times in the final report. • A Bioscreening Implementation Advisory Group should be formed to help specify protocols and guide utilities and the Board through the data collection and pilot program phases.	See responses to Comments 6.006, 8.003, 8.018, 8.020, 10.009, 10.014, and 10.027 regarding the timing of the phased implementation and response actions and response to Comments 8.016 and 8.022 regarding the Bioanalytical Advisory Group.	10. CECs and Attachment A

No.	Comment	Response	Categories
41.019	Unfortunately, staff has proposed to significantly deviate from the recommendations of the final CEC science advisory panel report and instead tie the outcome of bioassay tests, which are not sufficiently validated and standardized, to response actions that may have a direct impact on utilities. We strongly disagree with this approach.	See responses to Comments 6.006, 8.003, 8.018, 8.020, 10.009, 10.014, and 10.027 regarding the timing of the phased implementation and response actions.	10. CECs and Attachment A
41.020	The final CEC science advisory panel report defines standardization as providing confidence in the comparability of results. This is not the case with bioassay tests at this time. The final CEC report mentions there are four labs in the world currently conducting these tests – one outside of the United States. When our members contacted the laboratories, they gave a variety of answers on how the tests would be performed and requested a level of specificity regarding test parameters indicating a lack of method standardization. Effectively coordinating test details with the laboratories requires significant expertise in bioanalytical methods that is lacking outside of the research community at this time. This lack of standardization is likely to result in widely different numeric outcomes and an associated lack of reproducibility across different laboratories and recycled water facilities.	See responses to Comments 1.049, 10.009, 31.017, and 31.020.	10. CECs and Attachment A
41.021	While Board staff states that the bioassay testing is comparable to the CEC chemical testing, we again must strongly disagree. For the existing chemical tests for CECs there are at least four commercial and seven public agency labs in California that perform these tests, and the methods and standards for the tests have matured and are reproducible. As we do not believe the bioassay tests are adequately standardized and reproducible at this time and there are considerable questions about how exceeding these thresholds might impact human health, we strongly	See responses to Comments 31.005 and 10.009.	10. CECs and Attachment A

No.	Comment	Response	Categories
	disagree with tying the numeric outcomes to response actions.		
41.022	The proposed revision to the Policy states that the response actions include <u>but are not limited to</u> potentially performing "non-targeted analysis,", which is again, not recommended by the science advisory panel. Other actions include an open-ended response action of "modification of facility operations." Costly studies and monitoring are included in the response actions.	See responses to Comments 10.027 and 28.004. In addition, non-targeted analysis was recommended by the Science Advisory Panel as a follow-up action for exceedances of the monitoring trigger levels (see Science Advisory Panel Final Report, p. xii).	10. CECs and Attachment A
41.023	Another problem with including response actions for bioassays is that utilities will potentially have to explain to customers that certain thresholds have been exceeded and what that means for human health, despite the fact that this is not fully understood. In summary, we urge the Board to revise the Policy to follow the recommendations of the science advisory panel. We also urge the Board to contact members of the science advisory panel to discuss the current status of standardization and validation of bioassay testing and the science advisory panel recommendations more broadly. **Conclusion** A Recycled Water Policy that facilitates water reuse in California is of critical importance to our future water supplies. We are fully committed to working with the Board and staff to develop a Policy that advances the goal of increasing the use of recycled water throughout California.	See responses to Comments 8.016 and 8.022.	10. CECs and Attachment A
42	**Olivenhain Municipal Water District** **Commenter: Kimberly A. Thorner**		

No.	Comment	Response	Categories
42.001	OMWD recognizes the need to amend the Recycled Water Policy to make updates that reflect current regulations, as well as to provide clarifying language related to compliance. Given the past investments by millions of Californians to develop this drought-resilient supply that decreases potable water demand and increases supply reliability statewide, OMWD asks that consideration be made when developing these proposed amendments to avoid changes that would restrict recycled water use or serve as a disincentive for its development. This request is consistent with the first project goal to "Support the increased use of recycled water[..] to mitigate the effects of long-term drought, climate change, and water supply uncertainty." Additionally, this would ensure compliance with Governor Brown's California Water Action Plan, which also calls for an increase in the use of recycled water.	The commenter's request to avoid changes that would restrict recycled water use or serve as a disincentive for its development is in line with the purpose of the Amendment, 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 Amendment is consistent with this purpose.	1. Purpose
42.002	OMWD is appreciative of the incorporation of the CEC Advisory Panel's recommendation that the "monitoring of health-based CECs or performance indicator CECs is not required for recycled water used for landscape irrigation due to the low risk of ingestion of the water."	The Commenter supports Amendment language relating to not requiring CEC monitoring for non-potable uses; no change is requested.	10. CECs and Attachment A
42.003	OMWD offers the following specific recommendations. 1. Keep the goal of the Recycled Water Policy focused on the increased development of recycled water. The additional goal to minimize wastewater discharge to enclosed bays, estuaries, lagoon, and ocean waters fails to account for the cost-effectiveness or feasibility of doing so. An increase in wastewater that is salvaged and further treated into recycled water for beneficial use will result in a decrease in ocean discharge by default, and this additional goal is unnecessary. Furthermore, wastewater discharge should remain under the regulations established through NPDES and discharge permits	See responses to Comments 1.002 and 8.008.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
42.004	Amendments to reporting requirements should consider what reports are currently being required at the local level. Regional reporting requirements should be considered when developing any state-level reporting requirement to avoid redundant reports.	See response to Comment 1.037.	3. Goals, mandates, and reporting requirements
42.005	The inclusion of a cumulative impact analysis an unnecessary requirement that is already taken into consideration during the CEQA process and would result in project delays.	See response to Comment 13.009.	5. 1211 and WW Change Petitions
42.006	Salt Nutrient Management Plans are better suited to be incorporated into the Sustainable Groundwater Management Act and should be removed from the Recycled Water Policy.	See responses to Comments 1.026 and 1.027.	6. Salt and nutrient management plans
42.007	The deadline to transition recycled water general orders from Regional Boards to the 2016 General Order should be extended to two years to allow adequate time for engineering reports to be reviewed and/or updated if necessary. Existing permits that are in compliance with the Recycled Water Policy and that have updated engineering reports should remain valid outside of the 2016 General Order.	See responses to Comments 1.010 and 8.046.	11. Permit review and update
42.008	The response actions for bioassay results above a prescribed threshold should be developed after research is conducted and should incorporate recommendations from a panel of experts. OMWD supports the CEC Expert Panel's recommendation to form a Bioassay Monitoring Advisory Group. Standardized methodology for performing bioassays should be adopted.	See responses to Comments 8.016 and 8.022.	10. CECs and Attachment A
42.009	If you or your staff should need any additional details pertaining to this assessment, please do not hesitate to contact me at 760-753-6466 or kthorner@olivenhain.com.	This is the concluding statement of the comment letter, preceded by Comments 42.001 to 42.008.	12. General Comment

No.	Comment	Response	Categories
43	**TDC Environmental** **Commenter: Kelly D. Moran**		
43.001	Thank you for the opportunity to share my thoughts on the research program for constituents of emerging concern (CECs) in the proposed amended Recycled Water Policy. My thoughts, which relate to the Science Advisory Panel process described in Section 10.2 of the proposed policy, draw from my experience on multiple science advisory panels related to constituents of emerging concern, including DTSC's Green Ribbon Science Panel (which I co-chair), the Water Board's Surface Water Ambient Monitoring Program Stream Pollution Trends Monitoring Program (SWAMP SPoT) Science Review Committee, and my service as a science advisor for the SF Bay Regional Monitoring Program's Emerging Contaminants Program.	This is the introductory statement to the comment letter, followed by Comments 43.002 to 43.012.	10. CECs and Attachment A
43.002	**A. Panel Composition.** The proposed policy appears to conflate two separate CECs topics: (1) human health safety (e.g., recycled water that flows to drinking water supplies and human food) and (2) aquatic life safety (e.g., recycled water that flows into aquatic habitats). These two topics require different monitoring, different management, and different scientific expertise. I strongly encourage separation of these into two separate segments of the research program.	See responses to Comments 2.011 and 2.076.	10. CECs and Attachment A
43.003	The listed areas of expertise for the Science Advisory Panel apply primarily to human health protection and would best be used to describe the composition of a Science Advisory Panel addressing human health protection. A group of this composition (i.e., with a single environmental toxicologist and primarily human health experts) would be unlikely to have the capacity to provide the Water Board with robust advice in the arena of aquatic life protection. I suggest that the Water Board consider either (a) limiting the role of the	See responses to Comments 2.011 and 2.076.	10. CECs and Attachment A

No.	Comment	Response	Categories
	panel to human health protection or (b) convening a separate Science Advisory Panel to provide information and recommendations to Water Board staff with regard to aquatic life protection.		
43.004	Should the Water Board decide to convene a separate Panel to address CECs aquatic life protection, relevant expertise for this Panel should include: aquatic toxicology; analytical chemistry; CEC sources and discharge pathways; and fate and measurement of CECs in municipal wastewater and receiving waters. While perhaps not a required expertise, an expert in predictive modeling could also be an asset on such a panel.	See responses to Comments 2.011 and 2.076.	10. CECs and Attachment A
43.005	The understanding of true sources of CECs (e.g., presence in consumer products, discharge pathways) has a strong influence on the design of CECs monitoring programs. For example, CECs research monitoring should ordinarily not include chemicals that are no longer present in the indoor urban marketplace (e.g., chlorpyrifos) and likely should include chemicals that have not yet been monitored that are highly toxic and that are widely used in manners that can transfer meaningful quantities to the wastewater system (e.g., pet flea control chemicals). (I used pesticides as examples only, recognizing that these may not be part of this program). As such, I encourage the Water Board to list "CECs sources and discharge pathways" as a necessary expertise for any CECs Science Advisory Panel.	The suggested area of expertise on CECs sources and discharge pathways has been added to section 10.2.2 of the Amendment.	10. CECs and Attachment A
43.006	Typically, government agencies require Science Advisory Panel members to be free of conflicts of interest, such as employment or contracting (directly or through consulting firm employers) for parties that have an economic interest in the outcome of the panel's recommendations. This avoids turning the Panel into a stakeholder group. There are exceptions to this general rule, such as DTSC's Green Ribbon	Disclosure of conflict of interest has been required of Panel members for previously convened Science Advisory Panels and will continue to be required for future Panels.	10. CECs and Attachment A

No.	Comment	Response	Categories
	Science Panel. In that case, DTSC determined that if a small fraction of the membership of its panel was scientific experts (appointed as individuals) who happen to be employed by organizations with potential financial interest in the panel's recommendations DTSC would be able to receive useful scientific advice that would not otherwise be available. DTSC takes multiple actions to minimize the potential for panel discussions and recommendations to be stakeholder-driven, including requiring all Panel members to disclose all conflicts of interest and structuring its Panel's operations in a manner that recognizes conflicts of interest and that seeks to avoid asking conflicted members to weigh in on recommendations that would affect members' employers.		
43.007	**B. Panel Work Products** Is a written literature review report (Section 10.2.3) necessary? Most agencies rely on the expertise of panelists as their means of bringing in familiarity with the current state of scientific knowledge instead of requiring a panel to prepare a written report documenting its knowledge.	The Water Boards are working to develop a statewide CEC management strategy called the CEC Initiative, which would include developing internal processes and expertise on the current state of science. However, until the CEC Initiative is further underway, staff and stakeholders rely on the Science Advisory Panel to provide information on the current state of science and recommendations to guide future actions relating to CECs. The literature review allows the Panel the opportunity to consider latest published research in the developing field of CECs and distill the information they find most relevant for policy makers and stakeholders.	10. CECs and Attachment A
43.008	Although Science Advisory Panels are sometimes charged with preparing written reports, for cost reasons it is more typical for state agencies to request that panels review and comment on specific topics or to make recommendations verbally. In my experience, California state agencies usually use transcripts and meeting notes to document a science advisory panel's information, insights, and recommendations. This is a less labor intensive, lower cost approach. The lower cost allows the state to bring in a larger panel, which	The written reports are a synthesis of the Panel's work and recommendations and are well-liked and frequently used by the recycled water community. Also see response to Comment 43.007. The State Water Board evaluates the management questions each time the Panel is convened and can add additional management questions as needed.	10. CECs and Attachment A

No.	Comment	Response	Categories
	would be helpful here given the broad range of management questions that the state would like the panel to address.		
43.009	The proposed written report on the "current state of scientific knowledge regarding the risks of CECs to public health and the environment" would be a major exercise, typical of the output of a large group of scientists at a retreat-style conference (with some months of follow-up work), a process conducted by an expert panel with extensive assistance of technical expert staff who do much of the writing, or a review article written by an academic over the course of a year or more (often with graduate student assistance). Because preparing this type of report is burdensome, a requirement to prepare such a report limits the types of people who are willing to serve on the panel.	See response to Comment 43.007.	10. CECs and Attachment A
43.010	If a written summary document other than a transcript and meeting notes is necessary for the Water Board, I suggest that consideration be given to a memorandum outlining the Panel's recommendations instead of a literature review report. In my experience, such memoranda are usually written by staff based on the verbal discussion at the panel's meeting and then be reviewed, corrected, and approved by the panel.	See responses to Comments 43.007 and 43.008.	10. CECs and Attachment A
43.011	**C. Role of Indicators and surrogates (10.2.5.4) in ambient CECs Monitoring** Indicators and surrogates have great value for examining the operation of a treatment system but have questionable value in providing understanding of ecosystem hazards posed by CECs. In an ecosystem, indicators and surrogates may be able to prove the existence of an exposure pathway but may not always be able to prove the lack of an exposure pathway. In many cases, indicator and surrogate monitoring of surface waters may not be significantly better at answering management questions (e.g., downstream dilution) than predictive modeling, which is typically	As stated in section 3.7 of the Staff Report with SED, performance indicator CECs and surrogate parameters are included specifically to measure the effectiveness of the treatment process only and will not be used for ecosystem hazards posed by CECs. Therefore, comments addressing ambient CEC monitoring are out of scope for the Amendment. See responses to Comments 2.011 and 2.076.	10. CECs and Attachment A

No.	Comment	Response	Categories
	quicker and less expensive. In my experience, a combination of modeling and monitoring the actual CEC (rather than a surrogate or indicator) typically provides the most cost-effective management information. To address this, I suggest that the Water Board provide flexibility rather than requiring its Science Advisory Panel to address use of indicators and surrogates for any CECs research related to aquatic life protection.		
43.012	**Separation of Science and Policy.** I support the plan to have staff digest Science Advisory Panel recommendations and use them to develop recommendations for Water Board consideration (Section 10.2.6). This allows the Water Board staff to bring in policy and practical considerations that are not appropriate for a Science Advisory Panel. Practical considerations (e.g., availability of commercial laboratory methods at reasonable cost) typically are not within the expertise of Science Advisory Panel members. (Practical considerations do not need to be ignored – these can be integrated into charge questions or background information for a Panel). Policy (such as the weighing of cost compared to benefits of an action), is not the realm of any Science Advisory Panel. Separation of science from policy decisions frees the Panel to provide the state with its best science-based recommendations. This also appropriately separates the Science Advisory Panel from any stakeholder process around Water Board decisions.	Comment noted. The commenter is expressing support for the State Water Board to make policy decisions based on the Panel's scientific conclusions.	10. CECs and Attachment A
44	**Monterey One Water – Oral Comment at June 19, 2018 Hearing** **Commenter: Mike McCollough**		

No.	Comment	Response	Categories
44.001	Mr. McCollough reiterates one of the points WaterReuse brought up regarding the goal of minimizing discharge to treated estuaries. Mr. McCoullough states that utilizing recycled water will result in minimizing discharges to estuaries, enclosed bays, ocean waters, and coastal lagoons. Monterey One Water believes it is more appropriate to move this goal to the Intent section in the policy rather than making it a goal. It is implied that this goal will occur as more recycled water is used.	See response to Comment 1.002.	3. Goals, mandates, and reporting requirements
44.002	Regarding the bioanalytical process, Mr. McCollough participated in a webinar and was surprised throughout the presentation about the variability of potential requirements for the monitoring of CECs in recycled water. He states that it was alarming that there was a lack of consensus on the baseline parameters for standardization of those tools.	See responses to Comments 1.049, 10.009, 8.016 and 8.022.	10. CECs and Attachment A
44.003	Mr. McCollough states that it was interesting that some of the contract laboratories didn't agree about what tests would be most beneficial for those tools. There was a difference in cost and discussion of what changes would take place in existing laboratories, on-site, and agencies with limited resources. Mr. McCollough believes these changes would move in a direction that would be cost prohibitive.	See response to Comment 31.017.	10. CECs and Attachment A
44.004	The State Water Board convened the CEC Expert Panel but did not follow the exact recommendations the Panel provided. Instead, the State Water Board deviated away from what they were saying. Monterey One Water relies on the Expert Panel opinions and recommendations on how to move forward in dealing with CECs. The State Water Board should give more	See responses to Comments 8.003, 8.018, and 8.020. Response to Comment 6.006 addresses the desire for more time to implement the recommendations.	10. CECs and Attachment A

No.	Comment	Response	Categories
	time to implement the recommendations provided by the Panel.		
44.005	Finally, Monterey One Water believes SNMPs may have found a new home in SGMA. The inclusion of SNMPs in the Policy would have been beneficial if it was looking for a single source of a salt or nutrient within a basin. But now with the groundwater management plans that everyone will be required to do, it is possible to now implement those plans into a basin-wide, holistic water resource management process versus putting it in a recycled water management process. Salts and nutrients are not just in recycled water but the whole basin. Monterey One Water believes it would be more logical and practical to implement SNMPs into those new plans under SGMA.	See response to Comment 1.027.	6. Salt and nutrient management plans
45	**Gordon Innes, Public – Oral Comment at June 19, 2018 Hearing**		
45.001	Mr. Innes states that during his time with the State Water Board, there were two projects, both in LA, that initiated the development of the Policy. One was a potable reuse project in which the regional water board placed limitations on recycled water that were overly stringent. That was eventually resolved through a petition. The second project was an irrigation of a golf course with recycled water. For this project, the regional water board established limitations for the recycled water which were equivalent to the groundwater quality objectives. In this case, Mr. Innes believes the groundwater quality objective was 50 mg per liter for chloride. At the time, that seemed like a reasonable interpretation of the Basin Plan but the actual result, a prohibition on recycled water use, seemed totally unreasonable. This was certainly a	Comment noted. The commenter provides background on the history of the Recycled Water Policy.	6. Salt and nutrient management plans

No.	Comment	Response	Categories
	significant dilemma and a way to resolve this issue was to place SNMP requirements into the Policy. Even after a few years removed from addition of the SNMP requirements into the policy, this issue of how do you implement a water quality objective for groundwater still seems unresolved.		
45.002	We have gone through the SNMP planning process in which some of the regional boards have adopted SNMPs and concluded that since there is no problem within the basin, there is no need to go through a Basin Plan Amendment process. This is consistent with the policy itself that states that if there is no problem, then there is no need to amend the basin plan. However, Mr. Innes states that there is an odd logic to the conclusion that if there is a high quality of water available, then there is no need of a plan to protect that water. The same logic would not be applied to Lake Tahoe for example.	See responses to Comments 2.017, 2.093, and 5.024.	6. Salt and nutrient management plans
45.003	Mr. Innes encourages the board to fully go through the SNMP process and ensure that each of the basin plans are updated to reflect what the policy should be.	This comment is linked to Comment 45.002; see response to Comment 45.002.	6. Salt and nutrient management plans
46	**Central Valley Clean Water Association and Public – Oral Comment at June 19, 2018 Hearing** **Commenter: Tess Dunham**		

No.	Comment	Response	Categories
46.001	Ms. Dunham states that with respect to the Central Valley, there are a lot of small dischargers in which the monthly reporting requirements would become burdensome. These dischargers simply do not have the staff or resources to put together monthly reports. Ms. Dunham recommends that the monitoring requirements be graduated maybe based on size.	See response to Comment 2.100. The Amendment is revised to require annual reporting of the monthly data.	3. Goals, mandates, and reporting requirements
46.002	Dischargers in the past have received accommodations within their permits from the regional water boards to report on a quarterly basis and for some constituents on an annual basis. It is recommended there be some consistency with current reporting requirements for dischargers.	See responses to Comments 1.037 and 2.100.	3. Goals, mandates, and reporting requirements
46.003	Ms. Dunham also discussed the narrative goal in section 3.1.1 of the Amendment, specifically as it relates to estuaries. There are many POTWs in the Central Valley that discharge to the Delta. There is a goal of not just maintaining beneficial uses but the feasibility and practicality of taking recycled water and taking it from a discharge or wastewater and using it as a recycled water resource, especially on a seasonal basis. There are a lot of dischargers that have recycled water use during the summer months but do not have the infrastructure built up to store recycled water during the winter months. This seasonal discharge would create another issue with the reporting requirements stated in the Policy.	See responses to Comments 1.002, 1.037, and 2.100.	3. Goals, mandates, and reporting requirements

No.	Comment	Response	Categories
46.004	Ms. Dunham appreciates water board staff taking the time to think about the SNMPs already in existence. In a large part, there has been a significant effort in developing a comprehensive plan in the Central Valley. Ms. Dunham believes staff has done a good job at recognizing where basins have both robust SNMPs and basin plan amendments that have been adopted or are heading towards adoption.	The commenter is in support of staff analysis of the SNMP program.	6. Salt and nutrient management plans
46.005	From an agricultural perspective, Ms. Dunham states this policy is new since the policy before, other than some certain components, was limited to landscape irrigation. This is the first time this policy goes from landscape irrigation to all irrigation uses.	Comment noted. No specific change is requested.	12. General Comment
46.006	From the agricultural community, outreach was performed by both Water Boards staff and Ms. Dunham. This Policy may have been thought out on how it overlays with the Irrigated Lands Regulatory Program, but as a reminder to folks, when it comes to agricultural irrigation use, this is a totally new policy. Ms. Dunham believes that the Water Boards should keep in mind how the Policy deals in the agriculture world may be different in how it deals in the landscape world.	Comment noted. No specific change is requested.	12. General Comment