September 28, 2016

2014 Integrated Report: Responses to Comments

During the written public comment period for the draft Integrated Report, the San Diego Water Board received comments from municipalities, non-government organizations, and private entities. San Diego Water Board staff reviewed the comments and summarized responses in the below table. Additionally, as a significant portion of the comments are about specific listing decisions of particular waterbody segment/pollutant pairs, the San Diego Water Board compiled all decision changes for these specific listings into Supporting Document No. 5 to facilitate public review of responses and changes.

Comments received during the public comment period often resulted in changes. Changes included 1) changes without a change in listing, 2) changes with a change in listing, and 3) changes in waterbody characteristics. The changes made are included in the below responses, and will be incorporated into the State Water Board database as cited herein. Limitations in database management may result in a time delay between changes in response to comments and actual reflection of those changes in the public database.

List of Commenters:

Organization	
City of San Clemente	San Diego Coastkeeper
City of Chula Vista	City of Vista and City of Oceanside
City of Escondido	San Diego County Water Authority
City of Laguna Beach	Orange County of Public Works
City of Dana Point	National City
Center of Biology	NRG/Cabrillo
County of San Diego	Port of San Diego
Earth Law Center	

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No.	Author	Comment	Response
General Comments – Limitations of data assessment, triggers of off-cycle review, and TMDL scheduling, etc…			
1.01	City of San Clemente, City of Laguna Beach, City of Dana Point, County of San Diego; National City, the Cities of Vista and Oceanside, Orange County Public Works, City of San Juan	The Regional Board did not include in assessment all the available data as required by the Listing Policy. As stated in the Draft Integrated Report, a "significant amount of (available) data collected between August 2010 and July 2016" was not included in the analysis and only the data submitted during the 2010 solicitation was evaluated in this listing cycle. All available data should be considered to ensure the 303(d) list reflects the current (impairment) condition of our receiving waters so that such list will be useful in the	Comment noted. No changes have been made to the Integrated Report. The 2014 draft Integrated Report (IR) was prepared based on data originally submitted during the 2010 data solicitation period for the statewide 2012 IR cycle. The State Water Board issued a Notice of Public Solicitation of Water Quality Data and Information for 2012 Integrated Report on January 19, 2010. The issue of data solicitation for the IR was addressed in a memo issued by the State Water Board on November 12, 2013 (available online at http://www.waterboards.ca.gov/water_issues/programs/tmdl/docs/integr_rpt_upd_memo_final1113.pdf) to explain the strategy of handling data assessment in 2014 (and subsequently in 2016): "Due to the volume of data received during the 2010 data solicitation period, the State Water Board will not solicit additional data until all of the current data is assessed and migrated to the California Water Quality Assessment Database (CalWQA) for Regional Water Board listing and delisting recommendations." As a result, data submitted after the 2010 solicitation period were not included in the preparation of the 2014 draft Integrated Report for the San Diego Region.

		development of water quality priorities. Newer data could result in different listing decision if all available is considered. Further, the commenters request Board staff to provide more details on the Regional Water Board's process to trigger an off-cycle review and the process to be scheduled in a timely manner.	The State Board and Regional Boards are committed to making the Integrated Report process more efficient and submittals to USEPA more timely. In the past ten years, the volume of data submitted for review has significantly increased and outpaced the resources available at the San Diego Regional Board (San Diego Water Board) for such review (the volume of data submitted more than tripled in 2014 compared to in 2006. The San Diego Water Board shares understanding with the commenters that for most cases, data more than 10 years old may not best represent the most current water quality condition. To help the San Diego Water Board as well as regulated entities prioritize their efforts in protecting/restoring water quality and ecosystem health, the San Diego Water Board will consider the preparation of an off-cycle Integrated Report for the San Diego region after the State Water Board releases a new data solicitation letter (likely toward the end of 2016) for the next Integrated Report cycle. For potential off-cycle 303(d) List reviews, the San Diego Water Board will consider the effect of listing/delisting decisions on key beneficial use areas and will consider requests from the community that are of particular consequence and significance to the community.
1.02	City of San Clemente; City of Dana Point;	Non-Basin Plan or non-statewide plan based criteria (e.g., CTR) should not be used to establish the listing decisions.	Disagree. Section 6.1.3 of the 303(d) Listing Policy requires that "Narrative water quality objectives shall be evaluated using evaluation guidelines." The evaluation guidelines that the San Diego Water Board has selected to gauge the waterbody/pollutant conditions, including the CSCI scores for the evaluation of biological integrity, meet the requirements for evaluation guidelines as listed in Section 6.1.3 of the Listing Policy, i.e., : Applicable and protective to the beneficial use; linked to the pollutant under consideration; Scientifically-based and peer reviewed; Well described; and Identify a range above which impacts occur and below which no or few impacts are predicted. These evaluation guidelines are appropriate to use for assessing water body conditions including making listing/delisting decisions, and have been referenced in water body fact sheets as

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			appropriate.
1.03	City of Chula Vista; City of Escondido	The 303(d) Listing Policy was adopted in 2004; Water Boards should seek comments from interested parties to update the Listing Policy; Updates include expanded definitions for toxicants and conventional pollutants, reassessment of the criteria tables for listing and delisting, and updates to the types of pollutant and/or conditions that are addressed by the Listing Policy. Additionally, whereas the Listing Policy requires "TMDL schedule date" for all waterbody/pollutant combinations on the 303(d) lists, WQIPs can circumvent the need for TMDLs.	Comment noted. No changes made in the Report. The commenter may submit a request to the State Board to update the listing policy. The request should contain proposed updates and details/rationales of associated supporting information. The San Diego Water Board agrees that if designed appropriately and carried out successfully as planned, Water Quality Improvement Plans (WQIPs) may serve the purposes of TMDL alternatives. At this time, the San Diego Water Board is closely working with USEPA and other interested parties (e.g., non-governmental organizations and municipal stormwater permittees) to assess the appropriateness of using WQIPs as TMDL alternatives for specific waterbody/pollutant listings on a case by case basis. In response to comments regarding TMDL scheduling, a section has been added to the IR to highlight the San Diego Water Board's plan for USEPA's New Vision for the 303(d) Program. Also see responses to Comment 1.4.
1.04	City of Escondido	The Regional Board should establish a defined procedure for assigning and/or reassigning 303(d) listings of Category 4b or 4c, instead of defaulting to Category 5. More specifically, pollutants addressed by WQIP aside from TMDLs should be reflected.	Comment noted. No changes made in the Report. The procedures of categorizing waterbodies into Category 4C were detailed in Chapter Three of the Draft Integrated Report. Instead of making a flat decision region wide that WQIPs may serve as TMDL alternatives and hence placing waterbodies with pollutant(s) proposed to be addressed by WQIPs into Category 4b, the Regional Board considers it prudent to evaluate the appropriateness of WQIPs as TMDL alternatives on a case by case basis, taking into consideration potential differences in pollutant sources and hydrologic conditions of different watersheds, as well as levels of success of historical management actions including restoration activities at each watershed. Also see responses to Comment 1.5.

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1.05	City of Escondido	TMDL scheduling should be transparent and updated with each new Integrated Report, to reflect the true realities of state resources and priorities.	Agree. In general, the TMDL scheduling currently shown in the 2014 draft Integrated Report is based on an anticipated scheduling time of 11 to 13 years, as suggested by the State Board. As a key project within our Practical Vision and to put its limited resources to the most appropriate use, the San Diego Water Board is working on an effort to identify key (beneficial) uses and key areas/water bodies in the San Diego Region. This will guide our efforts to protect or restore water quality or ecosystem health. We anticipate the strategy will be made available for public comment and Board adoption in early 2017. The San Diego Water Board will determine future TMDL scheduling in accordance with the strategy and reflect any updates on the scheduling in each cycle of IR.
1.06	City of Dana Point	Source control of many pollutants begins far beyond the City's, County's (the Water Boards') authorities. More coordination with other State and regulatory agencies and efforts is needed to make demonstrable progress over the long-term. These sources/potential pollutant sources should be acknowledged in this program.	Comment Noted. No changes made in the Integrated Report. The San Diego Water Board agrees that closely working with other regulatory agencies, such as California Department of Pesticide Control and Department of Toxic Substances Control, for the development and implementation of appropriate source control strategies and measures will facilitate reducing certain pollutants in waterways. The San Diego Water Board is committed to cooperating with sister agencies of CalEPA in their efforts to improve water quality and ecosystem health in our Region. However, the purpose of the 2014 IR is not to find out effective source control measures or seek out future cooperation opportunities, but to present water quality (impairment) conditions, and so no changes were made in the Report.
General Comments – Bioassessment Data			
1.07	City of San Clemente; City of Escondido; City of Laguna Beach; City of Dana Point	State Board has not adopted biological guidelines, Regional Board has not established Biological Objectives in Basin Plan, and hence the biological guidelines in this IR (i.e., CSCI) is premature and should not be	Disagree. In response to our 2014 Triennial Basin Plan Review, the San Diego Water Board is currently developing biological objectives using the CSCI. Meanwhile, the use of the CSCI in the IR is done in accordance with Section 3.9 and 6.1.5.8 of the Listing Policy with biological data and impairment related to associated pollutants and/or pollution. The use of benthic macroinvertebrate data in this manner for Integrated Reporting purposes has been done previously in California in the Los Angeles

		used; any listings resultant of the exceedances of the guidelines should be removed	Region, which was approved by both State Board and USEPA. It is not used as a specific biological objective in this IR.
1.08	City of Escondido	Escondido Creek and San Marco Creek – Benthic Community Effects listings should be removed: Benthic Community Effects are "co-listed" in Category 4C which does not need TMDL, but other relevant places indicate TMDL is needed by 2025; it is unclear how to establish TMDL for Benthic Community Effects.	Waterbodies identified as having impaired benthic community effects pursuant to the Listing Policy are often associated with what the USEPA recognizes as pollutants (i.e. chemical) and pollution (e.g., hydromodification), resulting in the placement of specific waterbodies into multiple listing categories. For those waterbodies with benthic community effects, a TMDL is not required for the actual benthic community effects, as that would require a specific biological objective(s). Rather, the TMDL is required for the associated pollutant(s) that is/are causing the impairment of beneficial uses. TMDLs are not required for pollution that is not a pollutant. For a waterbody that has benthic community effects and both pollutant(s) AND pollution, associated pollutants can be addressed by TMDLs, TMDL alternatives, and/or through waterbody investigations that disassociate pollutants from the benthic community effects. The pollution (e.g. hydromodification, habitat alteration) is addressed through non-TMDL means.
1.09	City of Laguna Beach; City of Dana Point	The Stormwater Monitoring Coalition (SMC) Report finds no relationship between toxicity in ambient waters and degraded stream benthic communities. As a result, toxicity listings should not be linked to Benthic Community Effects listings.	The 5-year SMC Report focused on probability-based bioassessment to understand region-wide conditions and stressors based on estimated stream miles and not site-specific effects. The report found that for probabilistic sites water column toxicity was typically either rarely above thresholds or weakly associated with biological condition, making it a moderate to low priority across the southern California region. This does not mean that site-specific toxicity results are not associated with poor biological condition. Interestingly, nutrients were identified as a dominant stressor by the SMC report, and were an associated pollutant at 22 of 28 of those waterbodies identified as impaired in the Integrated Report, typically in conjunction with toxicity. Furthermore, the toxicity referenced as moderate in the SMC report was all water column. Sediment was not evaluated by the report but was identified as an area of concern. For example, the San Diego River was part of a State of California pilot causal assessment project, and results from the lower river found a relationship between sediment synthetic pyrethroids and one of the biological endpoints (stressor-response from the field). For the purposes of associating pollutants, it is important to note that, pursuant to USEPA guidance (2002), association is for potential pollutants. Toxicity for these waterbodies is a potential pollutant.

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1.10	Orange County Public Works, City of Dana Point	CSCI is not validated in reference streams with naturally high total dissolved solids concentrations (e.g., Salt Creek). Natural water of high TDS concentrations likely have lower CSCI scores. Selection of the 10th percentile of the reference dataset to indicate impairment is arbitrary and may not indicate impairment. It is important to recognize that the bottom 10% of sites in the reference dataset are still reference sites with limited human impact. Therefore, the CSCI should be used with caution and those associated listings should be deferred until a more rigorous and scientific method is developed that definitively links CSCI scores to other metrics with known adverse impacts on benthic biological communities.	TDS is a potential stressor for many stream systems in California, and many streams do have naturally elevated levels of TDS due to hydrology and underlying geology. Research on how elevated TDS may influence CSCI scores in reference systems was conducted by the City of San Diego and found that the CSCI worked well to at reference sites with naturally high TDS (City of San Diego 2015). In contrast, the older southern California IBI was found to be negatively influenced by high TDS levels. It is important to note that TDS in systems such as Salt Creek may be naturally elevated but also confounded by other associated pollutants (e.g. pesticides, toxicity) and pollution (hydromodification). Selection of the 10th percentile of the reference distribution to indicate impairment was done by the authors of Mazor et al. 2016 and was independently peer-reviewed. The selection and identification of reference is done at the desktop scale, and likely includes some sites which may not be "reference" due to localized impacts not discernable on a desktop basis or by field crews when sampling. For example, known upstream illegal marijuana grow operations could remove a site from reference status due to impacts on water quality. However, accurately identifying active grow sites in the tributary watershed by desktop remotely is largely infeasible. Please see response to comment 1.08 and 1.09 regarding definitive links to known adverse impacts and pollutant/pollution association.
1.11	City of Dana Point	The commenter disagrees with the inclusion of a generalized statement that pollutant exceedances of water quality objectives contributes to degraded benthic communities.	Under section 3.9 of the Listing Policy, the exceedance of water quality objectives for a pollutant(s) that results in listing(s) is sufficient information for association to benthic community effects.
1.12	City of Dana	As the technical limitation of	The Integrated Report does not rely on the southern California IBI as a line of evidence and those

	Point	Southern California IBI have been identified and the Board has decided to consider the CSCI as the appropriate approach for evaluating benthic community data, the Board's decision to suggest an IBI score of 40 indicates a biological impairment should be removed as a supporting line of evidence.	scores will not be used in the final decision listing(s) for waterbodies. IBI scores were retained within the database for informational purposes only.
1.13	City of Dana Point	Pollutants identified in the LOEs for Benthic Community Effects are not consistent with prioritized chemical stressors identified by the SMC.	See response to comment 1.9
1.14	County of San Diego; Cities of Vista and Oceanside	Santa Margarita River (lower) and Sweetwater River (upper) were listed based on CSCI scores (below 0.79). In both cases, the number of samples is below the minimum of five required to list a waterbody for conventional or other pollutant per Table 3.2 of the Listing Policy.	For the evaluation of benthic community effects there is not a minimum sample size of five. The Listing Policy at Section 3.9 specifies the number of samples and stations required for evaluation.
1.15	County of San Diego; Cities of Vista and Oceanside	Incorrect use of Nutrient Concentrations as an LOE for Benthic Community Listings: The Listing Policy, Section 3.9, states that the biological communities must be compared to reference sites and that the results be associated with "water or sediment	Nitrogen and phosphorous are chemical concentrations in water that have applicable water quality objectives in the San Diego Water Board Basin Plan. These chemicals can, do, and have the potential to affect benthic communities.

		concentrations of pollutants including but not limited to chemical concentrations, temperature, dissolved oxygen, and trash." Nutrients such as total nitrogen and total phosphorus are not included on this list of associated pollutants in the Listing Policy, and should not be included as secondary LOEs.	
1.16	County of San Diego; Cities of Vista and Oceanside	CSCI Impairment Threshold of 0.79 is Overly Conservative: The CSCI is a relatively new indexing tool that has recently been published for use in California (Mazor, et al 2016) and includes a predictive approach to estimate expected reference conditions at a sampling location. While the tool is an improvement over historic benthic community index tools (i.e., Index of Biotic Integrity (IBI) and the observed to expected ratio (O/E)) there are still specific details of the tool that are currently under revision (e.g., use of "distinct" or "non-distinct" Southwestern Association of Freshwater Invertebrate Taxonomists (SAFIT) Level 1 or 2 taxonomic	Please see response to Comment 1.10 regarding the 0.79 threshold (also referred to as the 10th percentile). The San Diego Water Board agrees that the CSCI is an improvement over the southern California IBI. The comment that the tool is under minor revision associated with SAFIT taxonomy is incorrect. The identified issue was the incorrect input of taxonomic data into the tool due to source database exporting errors, not tool errors. For the Integrated Report the San Diego Water Board consulted with Mazor et al. authors and recalculated all scores less than 0.79 and within the expected distribution of change that could result in a "corrected" score higher than 0.79. A total of three sites improved over 0.79. None of the changes warranted a change in proposed listings. The new scores were all added to the Integrated Report database for public review. The use of biological data was done in accordance with the Listing Policy and is being done by all three regions in the current listing cycle in coordination with State Board and their biological objective guidance development.

		data). The revisions are ongoing and do affect CSCI results. In addition, the Regional Board's selection of the threshold for impairment of a CSCI < 0.79 is overly conservative and the basis is unclear. Mazor et al. 2016, Table 6 indicates that 52% of sites located in "high activity" areas of the South Coast received CSCI scores of <0.63. Combining "moderate" and "high activity," 32% of sites in the South Coast were <0.63. A CSCI ≥ 0.79 is considered "possibly altered," and only 40% of samples in Table 6 met this criterion in the South Coast. For the purposes of developing the §303(d) list the Regional Board should use the category "likely altered" (CSCI≥0.63), which would protect the biologic beneficial use and allow stakeholders to accurately prioritize impaired waterways. Further, the use of the CSCI is not consistent with the policy currently under development at the State Water Resources Control Board for biological objectives and is not explicitly included in the Listing Policy.	The Listing Policy's guidance on use of biological data allows for the inclusion of the CSCI. It is important to note that the San Diego Water Board disagrees with the comment that "the Regional Board should use the category "likely altered" (CSCI≤0.63), which would protect the biologic beneficial use and allow stakeholders to accurately prioritize impaired waterways." The approach in the regional stormwater permit, under which the commenters are regulated, uses Water Quality Improvement Plans that specify that the municipalities and stakeholders are to identify <u>their</u> priorities. The use of the CSCI should be a part of this process, and the WQIPs have flexibility which allows for municipalities to conduct and propose their own identification of scoring thresholds for their planning and program purposes

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1.17	County of San Diego; Cities of Vista and Oceanside	Pollutant listings should not be linked to bio-community impairment without considering of temporal and seasonal differences. For example, for Santa Margarita River (lower) (49149), BMI data were collected in 2007, whereas chlorpyrifos exceedances were from 2003 during wet weather. Detailed comments were provided in the comment letter (page 11)	The use of bioassessment in water quality monitoring is intended to incorporate the spatial and temporal impacts over a season or seasons. The associated pollutants are identified as, at a minimum, potential associated stressors. It is also important to note that the detection of persistent compounds, such as organochlorine pesticides, are typically hydrophobic and can remain within a system for an extended time period.
1.18	County of San Diego; Cities of Vista and Oceanside	Sweetwater River (upper) (51753): do not have enough samples as required in table 3.2; additionally, both CSCI and IBI LOEs are used in the evaluation (see additional details on page 11)	Please see response to comment 1.14
1.19	San Diego Coastkeeper	The commenter strongly supports the utilization of the California Stream Condition Index (CSCI) to evaluate the biological condition of wadeable streams in the San Diego Region. More specifically, we strongly support the utilization of benthic macroinvertebrate data and the CSCI to assess stream beneficial use attainment pursuant to CWA 303(d) and 305(b). The robust reference pool and predictor	Comment noted. The State of California has conducted bioassessment for wadable stream systems for over fifteen years. The use of this data better allows the San Diego Water Board assess the impairment of COLD and WARM beneficial uses.

		methods of the CSCI provide a large and consistently defined reference data set that allows for a comparative assessment of wadeable streams in our region. Moreover, the CSCI was developed specifically, "for use in regulatory applications that affect the management of individual reaches," and thus the application of CSCI to the 303(d)/305(b) process is appropriate and welcome.	
1.20	Orange County Public Works	In many cases all NPDES bioassessment data or its data from certain stations (e.g. OC Public Works bioassessment data for total nitrogen for English Canyon, bioassessment data for phosphorus, turbidity and nitrogen for Segunda Deshecha Creek) were not used while it was used for other pollutant analyses in the same water body.	The San Diego Water Board utilized data submitted to State Board during the State Board data solicitation process. Based on the comment it appears data were not submitted for specific waterbodies but is available. The San Diego Water Board will re-assess these stations during the next Listing Cycle or could conduct an off-cycle re-assessment if warranted.
General Comments - Inconsistent Application of Listing Policy for Conventional and Other Pollutants			
1.21	County of San Diego, Cities of Vista and Oceanside,	The exceedances of conventional and other pollutants needed to place a water body on the 303(d) list should be greater than or equal to five. However, numerous	Disagree. Note that pursuant to Section 3.7.1 of the Listing Policy, nutrients such as total nitrogen and total phosphorus should be evaluated under Section 3.1 and with Table 3.1. According to Table 3.1, a minimum of two exceedances, out of a total sample size of less than or equal to 24, will place the

		listings, including total nitrogen, total phosphorus, benthic community, and surfactants are included on the draft 2014 303(d) list based on exceedance counts of less than five.	waterbody segment and pollutant on the 303(d) List for impairment due to nutrients. Benthic community evaluation was conducted under sections 3.9 and 6.1.5.8 of the listing policy, which are specific to the use of bioassessment data. Different surfactants may have toxic effects of various degrees on aquatic life (e.g., 4-MSBA is slightly toxic to algae whereas nonylphenol can be highly toxic to fish and macro-invertebrates), and hence they should be treated as toxic pollutants, i.e., using Table 3.1, for the evaluation of "Aquatic Life Support".
General Comments – Commercial ban of Diazinon in 2005			
1.22	County of San Diego; City of Escondido; National City; Cities of Vista and Oceanside	The Ban of Diazinon in 2005 should be included in the consideration and the decreasing trends of diazinon concentrations in multiple surface water bodies suggest that the listing for diazinon should be removed per Section 3.10 or 4.10 of the Listing Policy. The following water body segments are affected: Agua Hedionda Creek (47453); Escondido Creek (47734); Los Penasquitos Creek (47555); San Diego River (Lower) (49392); Sweetwater River (Lower) (53461) (additionally, other stations 909SWT01-03, 05 show zero exceedances, per National City comment)	Agree. Considering that the nationwide ban on diazinon went in effect in 2005, the San Diego Water Board reviewed the data of affected waterbody segments for the periods 2005 and beyond. The sample exceedance ratios were recalculated and updated in corresponding LOEs and decisions. As a result, the listings of diazinon for Agua Hedionda Creek, Escondido Creek, Los Penasquitos Creek, San Diego River (lower) and Sweetwater River (lower) were removed.

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General Comments –			
1.23	Center of Biology	Effects of Ocean Acidification and related issues	Please see response to comment 1.28 regarding evaluation of existing data. The San Diego Water Board is concerned with the effects of ocean acidification on marine and estuarine beneficial uses, as potential changes in pH and impacts on food web dynamics are well documented, as presented by both the commenter and in the literature. To list a waterbody as impaired due to ocean acidification, the San Diego Water Board would need to utilize a weight of evidence approach or trends evaluation, consistent with the listing policy, using San Diego Region-specific data in lieu of water quality objectives (see 3.10 below). Insufficient data to conduct this assessment was submitted to State Board during the data solicitation period. The San Diego Water Board strongly encourages the commenter to submit chemical and biological data for the San Diego Region to State Board during the next Listing Cycle. The submitted studies (citations) generally discuss potentially deleterious effects of atmospheric deposition on ocean acidity and negative impacts to aquatic organisms such as shellfish and zooplankton. None of the studies document specific water quality impairments to waterbodies in the San Diego Region and thus the data and information submitted by the commenter is inapplicable and/or inconclusive for the purposes of making a listing decision. See Ctr. For Biological Diversity v. U.S. E.P.A., 90 F. Supp. 3d 1177, 1204 (2015)(deferring to EPA determination that ocean acidification evidence was insufficient to support a 303(d) listing decision). The commenter argues that EPA has mandated the San Diego Water Board to solicit and consider information related to ocean acidification. It has not. EPA's 2010 Memorandum on this issue encourages States to focus listing efforts on waters vulnerable to ocean acidification, but acknowledges that the relevant information is often "absent or limited". ((2010 Memorandum, p. 4.) The commenter is correct that antidegradation can be evaluated to determine potential impairment and warrant listing. Sufficient data from the solicitation period is not available to assess antidegradation in accordance with section 3.10 of the Listing Policy:

			3.10 Trends in Water Quality A water segment shall be placed on the section 303(d) list if the water segment exhibits concentrations of pollutants or water body conditions for any listing factor that shows a trend of declining water quality standards attainment. This section is focused on addressing the antidegradation component of water quality standards and threatened waters as defined in 40 CFR 130.2(j) by identifying trends of declining water quality. Numeric, pollutant-specific water quality objectives need not be exceeded to satisfy this listing factor. In assessing trends in water quality RWQCBs shall: 1. Use data collected for at least three years; 2. Establish specific baseline conditions; 3. Specify statistical approaches used to evaluate the declining trend in water quality measurements; 4. Specify the influence of seasonal effects, interannual effects, changes in monitoring methods, changes in analysis of samples, and other factors deemed appropriate; 5. Determine the occurrence of adverse biological response (section 3.8), degradation of biological populations and communities (section 3.9), or toxicity (section 3.6); and 6. Assess whether the declining trend in water quality is expected to not meet water quality standards by the next listing cycle. Waters shall be placed on the section 303(d) list if the declining trend in water quality is substantiated (steps 1 through 4 above) and impacts are observed (step 5). It is possible for the San Diego Water Board to undertake an antidegradation analysis during the next listing cycle or during an off-cycle effort, should resources allow.

			In regards to the current water quality criteria for pH, the section 303(d) Listing process is not designed, intended, nor able to change existing water quality standards. The San Diego Water Board agrees that more ecologically meaningful criteria would assist in the protection of marine and estuarine beneficial uses. The San Diego Water Board suggests that the proposed modifications for marine waters be raised to the State Board during review of the California Ocean Plan. For enclosed bays and estuaries, the commenter is encouraged to propose amending the San Diego Water Board Basin Plan during the next Basin Plan Review period. Given the magnitude and scope of ocean acidification the San Diego Water Board suggests the commenter request State Board consider ocean acidification, specifically criteria and data use, as a state-wide issue for independent impairment assessment. This is consistent with other efforts, such as Mercury, and could be specifically handled as a part of the State's Ocean Plan.
1.24	Earth Law Center	The commenter supports listing water body segments as impaired due to hydromodification and habitat alteration in Category 4C, as presented in the Draft Integrated Report	Comment Noted.
1.25	Port of San Diego	Understanding and controlling upstream loading and upstream areas of sediment toxicity is critical to achieving long-term improvements in the Bay: The current waterbody segment listings and their associated management plan timelines (i.e. TMDL, TMDL Alternative or other actions) do not fully take	Comments noted. No changes made in the Report. The purpose of the 2014 Integrated Report is to report the assessment results, including water body impairment conditions as shown in the 303(d) listings, and to present information with respect to existing/developing TMDLs or TMDL alternatives. The purpose of the 2014 IR is not to propose or develop TMDL or TMDL alternatives to address the identified impairments. The San Diego Water Board acknowledges the "interconnectedness" of upstream watersheds and San Diego Bay, which will be studied and addressed in management actions, such as the San Diego Bay Strategy project, as appropriate.

		into consideration the interconnectedness of the watershed as a whole and the role that upstream source loading may play in current Bay conditions. The District is committed to preservation and enhancement of the Bay and its resources, and recognizes that in addition to upstream loading issues associated with certain waterbody segments, legacy contaminants such as PCBs continue to flow into the Bay from upstream sources. These upstream sources should be eliminated through TMDLs, TMDL alternatives or other actions prior to or in tandem with Bay remediation efforts to avoid recontamination.	
1.26	Port of San Diego	There is concern that many of the scheduled TMDL completion dates pertaining to the Bay may not be achievable: The District prefers to see programs adopted in a more expedited fashion than the projected TMDL completion timelines listed in Appendix B of the Draft Report. As such, the District offers the following recommendations:	Comment noted. No changes made in the Report. For segments being covered under existing TMDLs, the TMDL completion date was added as consistent with the existing TMDL schedule. For segments not being covered with existing TMDLs, the TMDL completion dates of 2027 were set as a goal to expedite the restoration of impaired water quality. This statewide practice, i.e., choosing 11 to 13 years from the time a decision was made as the target TMDL completion dates, was followed in the 2014 IR process before the Prioritization Strategy as introduced in response to comment #1.1 above is finalized, adopted by the San Diego Water Board and factored in the TMDL scheduling process. Also see responses to Comment 1.5. The commenter's suggestions as summarized in this comment will be considered in the TMDL

		a. TMDLs or TMDL alternatives should factor in the completed or near-term cleanup efforts in the Bay. Many impaired segments are adjacent to portions of the Bay in which clean up orders were recently completed. Moreover, some recent data suggests that recontamination of cleanup sites may be occurring from ongoing sources. For the most effective and efficient long-term improvements, both ongoing sources and legacy contaminants must be concurrently addressed. b. Explore expedited management options (i.e. programs other than a TMDL or TMDL alternatives) so that restoration of the Bay's beneficial uses occurs in a timely manner. c. Reprioritize TMDLs or TMDL alternatives based on the management goals identified within the San Diego Bay Strategy; adjust resources strategically to align timelines with the prioritized management goals.	scheduling of future IR process following the Prioritization Strategy. No changes are made in the 2014 IR. It is important to note that TMDL scheduling does not and should not restrict source identification and reduction efforts. The Integrated Report is not the only consideration for prioritization.

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1.27	Port of San Diego	Decision ID 33669 for San Diego Bay lists several "sources" for PCBs including "Contaminated Sediments," "Dredging," and "Historic Land Management Activities" (Appendix I, page 155). These three categories are not accurate representations of sources of PCBs in San Diego Bay and should be removed: • Contaminated sediments were not contaminated prior to the discharge of PCBs from another source. • Dredging projects are not a source of PCBs. Rather dredging projects are intended to remove PCBs and other contaminants from the Bay. • Historic land management activities, at most, designated acceptable or unacceptable uses for property but did not result in discharges of PCBs or any other contaminant. Rather, the facility activities, whether they were authorized or not resulted in these discharges. Actual sources of PCBs. Examples include: paint, dielectric and coolant fluids,	Comment noted. No changes made in the Report. Under section 6.1.2.2 of the Listing Policy, the San Diego Water Board shall identify "**potential** sources" of the pollutant related to the impairment. The identification of potential sources for pollutants, current and/or historic, are related primarily to Water Board programs. They do not identify specific products or application production use(s) of PCBs (e.g. transformers). For example, a "potential source" related to the pollutant impairment would be the discharge of contaminated sediments at historic industrial sites via storm drains. The same is applicable to other potential sources for other listings. For example, if agriculture is a potential source for a nutrient listing, the actual specific product and application of product on crop type containing nutrients is not identified. Thus, no change is warranted. The determination of actual sources and loading is conducted as part of the TMDL, TMDL alternative, or other regulatory processes.

		hydraulic fluids, pesticide extenders, sealants, caulking, adhesives, waterproofing compounds, industrial operations within the San Diego Bay watershed, and atmospheric deposition.	
1.28	San Diego Coast Keeper	Sections 305(b) and 303(d) of the Clean Water Act and associated regulations require states to assemble and evaluate all existing and available data and information. The limitation to only assessing data submitted prior to August 2010 is illegal, as the Clean Water Act requires that descriptions of water quality and assessment of impairments are based on *current* or *contemporary* descriptions and impairments, and not water quality descriptions and impairments as they existed a decade or more ago. The result of the failure to review all readily available data is that the List likely does not set forth the full extent of impaired waters in our region and this process does not and cannot allow for timely and effective action to address the poor quality of our region's and state	In response to the comment, the San Diego Water Board has added language to the resolution regarding the age of the data. The commenter may wish to address timing and process during the State Water Board public review period. The comment regarding existing and available data appears to be central to the State Board process, as the commenter cites agreements between USEPA and State Board that did not involve the San Diego Water Board. The Integrated Reporting process has been centralized by State Board. State Water Board conducts calls for data, database funding and management, initial data entry, and Regional Board assignment and scheduling for reporting. The San Diego Water Board would like to utilize data external from the regional and data scheduling of State Board, potentially including trend analysis, weight-of-evidence approaches, and anti-degradation evaluations. However, the volume of data, database processing time requirement, and data age largely prevent the utility of doing so and thus the allocation of resources. Thus, the San Diego Water Board would like to prioritize data evaluation for priority waterbodies/pollutants at a time that is "off-cycle" from the State Water Board process. Theoretically the inclusion of data newer than August 2010 could be done by the San Diego Water Board as part of the Integrated Report. However, per State Water Board process, this data would be required to be included within the State Water Board database, managed and reviewed by State Water Board, and ultimately approved by State Water Board as part of the Integrated Report. Communications with State Water Board staff regarding data newer than August 2010 have resulted in non-inclusion by the San Diego Water Board, consistent with the State Water Board November 2013 memo cited in Response to Comment 1.1. The commenter is correct that the current Integrated Report likely does not set forth the full extent of impaired waters in our region due to the age of the data. Importantly, the Integrated Report also likely does not include data which would result in the delisting of currently listed waterbodies or the identification of additional waterbodies where beneficial uses are being met (Category 1 and

		waters. Regardless of any agreement the State Board may have reached with the USEPA, the limitation of data and information and associated time constraint are contrary to Clean Water Act regulations, the Updated 2015 State Listing Policy, and ongoing EPA guidance, each of which requires the evaluation and assessment of *all* existing data and information. As such, both the State and Region 9 Water Boards are required to consider valid data and information generated after August 2010 in the current 305(b) and 303(d) process to ensure compliance with federal and state requirements.	2). Section 6.1 of the Listing Policy lays out the "Process for Evaluation of Readily Available Data and Information." Section 6.1.1 defines "Readily Available Data and Information." However, this definition does not provide a temporal context regarding the timing of the data, except that at a minimum, the most recent section 303(d) list and 305(b) report be utilized.
1.29	San Diego Coast Keeper	The commenter urges the San Diego Regional Board to allow for and consider regular (biennially) off-cycle considerations and examinations of data for 303(d) listing. To ensure the most current data is utilized in assessment and prioritization we encourage the Regional Board to carry out within the next year a broader regional solicitation for all data	Comment noted. To help the San Diego Water Board as well as regulated entities prioritize their efforts in protecting/restoring water qualities and ecosystem health, the San Diego Water Board will consider the preparation of an off-cycle Report for the San Diego region after the State Water Board releases a new data solicitation letter (likely toward the end of 2016) for the next IR cycle. For potential off-cycle 303(d) List reviews, the San Diego Water Board will consider the effect of listing/delisting decisions on key beneficial use areas and will consider requests from the community that are of particular consequence and significance to the community.

		and information available on our region's waterways, and put into place a process to assess that data and information for 303(d) inclusion on an expedited basis.	
1.30	San Diego Coast Keeper	The commenter supports the listing of San Mateo Creek for invasive species, however suggest change this water body to Category 5 because invasive species should be considered a "pollutant", not "pollution" per CWA definition.	Agree. The comment is correct as the Clean Water Act (Section 502) defines pollutant as: *dredged spoil, solid waste, incinerator residue, sewage, garbage, sewage sludge, munitions, chemical wastes, **biological materials**, radioactive materials, heat, wrecked or discarded equipment, rock, sand, cellar dirt and industrial, municipal, and agricultural waste discharged into water (*emphasis added) Upon further review of prior Regional Board decisions related to invasive species with specific documented impairment of beneficial uses, the San Diego Water Board has concluded the waterbody should indeed be listed in Category 5 for invasive species impairing the RARE beneficial use. The change has been made to the Integrated Report. The San Diego Water Board will work with the State Board to update the LOEs and waterbody beneficial uses designations to reflect this change. Additional language has been added to the Staff Report.
1.31	San Diego Coast Keeper	The commenter supports the Regional Board's actions in concurrently listing nearly 30 waterbody segments as impaired for Habitat Alteration and Hydromodification (4C listings) in addition to existing Category 5 listings for those waterbodies. The commenter urges both the State and Regional Boards to work together to devise a uniform system whereby an	Comment noted. The San Diego Water Board expects to use, and for regulated entities to use, information about habitat alteration and hydromodification in order to better: 1) Identify and assess priorities 2) Guide non-TMDL regulatory efforts 3) Evaluate potential funding sources/opportunities (e.g. Supplemental Environmental Projects, Grants, etc…)

		assessed waterbody segment can be placed into multiple categories depending on which specific beneficial uses are, or are not, being met. The commenter urges the Regional Board to prioritize restoration of waters listed as impaired for habitat alteration and hydromodification despite the fact that the EPA does not require TMDLs for pollution-caused impairments	
1.32	San Diego Coastkeeper	The commenter encourages the Regional and State Boards to more actively solicit, encourage, and consider evidence under both "Trends" (Section 3.10 of Listing Policy) and "Weight of Evidence" (Section 3.11) approaches in the off-cycle and upcoming integrated report processes	Comment noted. No changes made in the Report. The San Diego Water Board is in the processing of exploring and standardizing appropriate (statistical) trend analysis methods in the assessment of water quality data, and plans to use these methods more often and as appropriate in future cycles of Integrated Report assessment. On a case-by-case basis, the San Diego Water Board will also consider and employ as appropriate the "Weight of Evidence" approach.
1.33	San Diego Coastkeeper	TMDLs and Insufficiency of 4B Listings Determinations: the commenter is seriously concerned over the Regional Board's chosen strategy to employ TMDL-alternatives as opposed to TMDLs in addressing impaired waterways. Our concerns with this approach are heightened by the fact that such	Comment noted. Tijuana River and Tijuana River Estuary have been changed from Category 4B to Category 5-Alt. Additional waterbodies identified as potential 4b have been placed in Category 5-Alt unless identified as formally qualified for 4b (e.g. Loma Alta Slough). Please note these changes have been made in the Integrated Report and database but may not appear correctly until the database is updated. The San Diego Water Board agrees that it is prudent to place Tijuana River and Tijuana River Estuary in Category 5 (5-Alt) at this time to provide adequate incentives for speeding up cleanup/restoration activities at these water bodies. Thus, the waterbody is still identified as impaired for those pollutants with the expectation that the alternative approach will remove the

		alternatives are not subject to a rigorous and transparent showing, such as a reasonable assurance analysis, that actions taken under those alternatives will result in outcomes sought and the attainment of beneficial uses and, ultimately, de-listings. The commenter recommends the Regional Board amend the Draft Report to include all information required by EPA Guidance documents for each TMDL alternative listed. Further, we strongly urge the Board, should it decide to continue to move forward with TMDL alternatives, to require that RAAs or similar assurances accompany any such TMDL alternative processes in order to ensure actions planned will result in the achievement of beneficial uses.	listing, though a traditional TMDL will still be required if the alternative approach is insufficient. The San Diego Water Board will work closely with USEPA and interested entities, including and not be limited to, municipalities and non-government organizations, to explore the potential of using TMDL alternatives to expedite water quality restoration projects. For any projects proposed as TMDL alternatives, the San Diego Water Board will diligently work with USEPA and interested entities to identify, and require the submittal of, as appropriate, necessary supporting information or analysis which demonstrates that the proposed projects will likely achieve planned improvement of water quality within proposed time frame. It is important to note that alternative approaches to date (e.g. Loma Alta Slough) are subject to the same level of restoration evaluation development as a traditional TMDL, which is largely necessary to identify an alternative approach as feasible. The Loma Alta Slough alternative approach was adopted by Resolution, with opportunity for public review and input, by the San Diego Water Board and includes a draft TMDL and language stating a traditional TMDL will be utilized if follow-up actions and effectiveness monitoring do not show progress and final achievement of numeric targets.
1.34	San Diego Coastkeeper	Finally, we note however the Regional Board decides to achieve compliance with Water Quality Standards in impaired waters, the Board cannot extend compliance deadlines beyond 2010 where pollutants listed in the California Toxics Rule (CTR) are causing the impairment.	Staff disagrees. With respect to existing TMDLs authorizing California Toxics Rule (CTR) based compliance schedules beyond 2010, the State Water Board's Policy for Compliance Schedules in National Pollutant Discharge Elimination System Permits (Compliance Schedule Policy) does not apply. (Compliance Schedule Policy, p. 7.) With respect to CTR-based compliance schedules in future TMDLs, the San Diego Water Board agrees that compliance schedules are no longer authorized by the CTR, the Compliance Schedule Policy, or the Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California in certain instances. However under these circumstances, the San Diego Water Board may still implement CTR-based compliance schedules in TMDLs with authorization from EPA in accordance with Clean Water Act

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		NPDES permits that include either a TMDL Waste Load Allocation or any alternative means of compliance cannot postpone compliance to the future. Both the Inland Surface Water Plan (ISWP), which implements the CTR for all NPDES permits except stormwater permits, and the CTR itself authorized 10-year compliance schedules for achieving CTR criteria, and included a specific sunset provision of May 2010 for CTR compliance. Thus any NPDES permitting scheme purporting to achieve compliance later than 2010 with CTR standards in waters impaired for CTR pollutants is on its face illegal	Section 303(c)(2). Under Clean Water Act Section 303(c)(2), and the implementing regulations in 40 CFR 131.13, EPA may approve or disapprove new or revised state water quality standards, including beneficial use, water quality criteria and certain policies and procedures for the implementation of water quality standards. The EPA administrator has stated that compliance schedules fall within the category of "policies" appropriate for review under 303(c)(2) and 40 CFR 131.13. In the Matter of Star-Kist Caribe, Inc. Petitioner, 3 E.A.D. 172, 182-183, n16 (E.P.A. 1990). As such, a CTR-based compliance schedule, including interim waste load allocations, in a TMDL, may be appropriate with review and approval by EPA.
Specific Comments – The commenters pointed out that specific listings of some waterbody /pollutant combinations should be re-evaluated due to faulty assessment, including and not limited to, insufficient exceedance counts, inappropriate inclusion of station data or use of draft water quality criteria, etc. Affected waterbody(ies)/pollutant(s) listings with brief discussions of comments are listed below.			
2.01	City of San Clemente	Cristianitos Creek/Ni (insufficient exceedance counts)	Agree. The 303(d) listing of this waterbody as impaired ("Listing") for Ni is removed for Cristianitos Creek (decision #48374)
2.02	City of San	Segunda Deshecha/Cd, Ni, Cu (insufficient exceedance counts)	Agree.

	Clemente		Listings for Cd, Ni, Cu are removed for Segunda Deshecha Creek (decisions # 49444, 49454,49449)
2.03	City of San Clemente	Prima Deshecha/Hg (not enough information)	Agree. Listing for Hg is removed for Prima Deshecha Creek (decision # 48508)
2.04	City of San Clemente	Segunda Deshecha/Hg (not enough information)	Agree. Listing for Hg is removed for Segunda Deshecha Creek (decision # 49468)
2.05	City of San Clemente	Prima Deshecha Creek/N+P (wet weather related data contributing to exceedance, should be placed in Category 3)	Disagree. Samples collected in dry weather on November 7, 2002 and June, 10, 2003 also exceeded the criteria for N and P for the prevention of biostimulatory substances. The final exceedance counts should be eight over nine for both total nitrogen and total phosphorous. The San Diego Water Board will work with the State Board to update the LOE as appropriate.
2.06	City of San Clemente	Segunda Deshecha Creek/N+P (wet weather related data contributing to exceedance, should be placed in Category 3)	Disagree. Samples collected in dry weather in October 2003 also exceeded the criteria for N and P for the prevention of biostimulatory substances. The final exceedance counts should be 9/12 for total nitrogen and 11/12 for total phosphorus. The San Diego Water Board will work with the State Board to update the LOE as appropriate.
2.07	City of San Clemente	Toxicity exceedances and Chemical Exceedances should not be linked together – suggest only list for toxicity, not linking to chemicals	Disagree. Pursuant to Section 3.6 of the Listing Policy, which states that "The segment shall be listed if the observed toxicity is associated with a pollutant or pollutants", as well as the State Board's directive, which encourages conducting Toxicity Identification Evaluations to find out the causing pollutant(s) of toxicity in waters, toxicity listings are associated with other pollutant listings, provided that temporal and spatial correlations are justified.
2.08	City of San Clemente	Non-basin plan and non-CTR guideline values should not be used; TIE should be used to list a	Disagree. According to the Listing Policy, guidelines that meet the requirements listed under Section 6.1.3

		chemical	should be used to assess the beneficial use support status of water quality. Also see responses to Comment #1.2.
2.09	City of Chula Vista	Sweetwater River, lower/chlorpyrifos (more recent data shows no impairment); diazinon (EPA ban in effect in 2005); post 2008 data provided in attachment	Comment noted. Listing decision remains for Sweetwater River (lower)/chlorpyrifos. The diazinon listing for Sweetwater River (lower) has been removed. See responses to comment No. 1.22 for more information. The decision to list chlorpyrifos for Sweetwater River (lower) remains unchanged because: 1) for many samples the reporting limit (i.e., 0.05 ug/L) for chlorpyrifos was too high to determine the water quality attainment status and so could not be included in the valid sample counts; 2) the correct exceedance counts would be three exceedances out of 25 samples if the referenced data up to 2014 were included in the assessment, which still justifies a Listing. Please note that uncertainties associated with "J" flagged values would result in those samples not being included in the valid sample counts.
2.10	City of Escondido	Escondido Creek/Diazinon (Decision # 47734), Diazinon was banned in 2005, not sure why RB choose to list diazinon this cycle. Newer data including 2014/2015 shows zero exceedances since 2003. Significantly decreasing trend (Section 3.10 of Listing Policy) of diazinon suggests this pollutant should be delisted.	Agree. The nation-wide ban on diazinon went to effect in 2005. Post 2005 data were re-evaluated for exceedances of diazinon. Results were updated in corresponding LOEs and decisions as appropriate. The listing of diazinon for Escondido Creek was removed.
2.11	City of Escondido	Escondido Creek/MBAS (Decision # 47747): faulty assessment.	Agree. Data were re-assessed and the correct exceedance rate is zero out of 27. Listing of MBAS for Escondido Creek is removed.
2.12	City of	Newer data (especially after	Comment noted. Listing decisions for selenium at Escondido Creek and San Marcos Creek remain

	Escondido	2010) suggest that Escondido Creek and San Marcos Creek should be delisted for selenium.	unchanged. Pursuant to State Board directive, data collected after August 30, 2010 will not be included in the 2014 assessment. Those data, if submitted in CEDEN, will be included as high priority data in the next cycle (or "off-cycle") assessment as appropriate.
2.13	City of Laguna Beach	Laguna Canyon Channel/Mercury, discrepancies in factsheet vs. LOE.	Agree. The Mercury data for samples collected at Laguna Canyon Channel was reassessed. Only one sample was collected on November 4, 2008 and showed a result of less than detection limit (<0.05 ug/L), which did not exceed the water quality criteria of mercury for the protection of fresh water aquatic life. The LOE (#74109) and decision (#62900) has been revised to reflect this change.
2.14	City of Laguna Beach	Pacific Ocean Shoreline, Laguna Beach HSA, at Broadway Creek/FIB listing is not necessary as this segment is located in between two existing 303(d) FIB listings, which have been included in the 20 beach/creek TMDL	Disagree. The listing remains, only the Category is changed to 4a. As this water body segment has not been listed before, the listing remains unchanged. However, this water body segment is covered under the existing 20 beach/creek TMDL for bacteria, this water body segment is placed into 4a, instead of 5.
2.15	City of Laguna Beach	Laguna Canyon Channel/Total Coliform should not be listed; no health advisory has been issued by CDPH for elevated total coliform	Agree. However, note that this water body segment is not listed for total coliform, but for enterococcus and fecal coliform. This clarification is at the "comment" section at the bottom of the fact sheet.
2.16	City of Laguna Beach	Phosphorus and Nitrogen listings are premature; listings should be deferred until the State develops biological criteria using the nutrient numeric endpoint approach	Disagree. Before the State develops biological criteria using the nutrient numeric endpoint approach, existing water quality objectives contained in the Basin Plan, which are protective of water quality from nutrient impairment, should continue to be used to assess potential impairment of water quality due to excessive nutrients. Site specific objectives for nutrients may be proposed on a case-by-case basis.

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2.17	City of Dana Point	The application of the Shellfish standard to the entire stretch of coastline in our region is flawed. It's not prudent use of any of our resources to evaluate data against flawed standards (Shellfish white paper attached to comment letter)	Comment noted. No changes made in the Report. Thanks for bringing the "white paper" regarding "Shellfish harvesting" to the San Diego Water Board staff's attention. The San Diego Water Board is obligated to evaluate water quality attainment status and report those that do not support their designated beneficial uses. The San Diego Water Board staff agrees that better delineation of the geographical extent of the recreational shellfish harvesting beneficial use area to where it actually occurs rather than the entire coast line will be appropriate to direct our limited resources to the best use. However, before new water quality standards (e.g., for "shellfish harvesting") are updated and adopted in the Basin Plan and Ocean Plan, existing applicable water quality standards should be used to evaluate beneficial use attainment, as presented in the draft Integrated Report for the shorelines in the San Diego Region for SHELL. In the prioritization process of our Region's TMDLs, the San Diego Water Board will take into consideration the geographical extent where recreational shellfish harvesting activities truly exist.
2.18	City of Dana Point	Salt Creek/Mercury: discrepancies in the Fact Sheet and data files, likely faulty assessment.	Agree. Listing decision for Hg is deleted for Salt Creek.
2.19	City of Dana Point	Aquatic life benchmarks for malathion are not adopted objectives in Basin Plan and should not be used.	Disagree. The criteria value of 0.1 ug/L is the Criteria Continuous Concentration (CCC) for malathion that USEPA recommends for the protection of aquatic life in fresh and salt water (USEPA, 2006). It meets the guideline selection criteria as listed in Section 6.1.3 of the Listing Policy, and is appropriate to use for the adequate protection of aquatic life from exposure to malathion.
2.20	City of Dana Point	Only data from 2006-2010 should be evaluated for listing decisions in the 2014 cycle.	Disagree. The inclusion of historical data is important to evaluate trends for pollutants, especially for cases where data are sparse. Unless effective management actions have been carried out that justifies

		Older data consisting of many exceedances do not necessarily represent more recent water quality.	"resetting" the (starting time of) evaluation periods, historical data should be included in the assessment for trends of water quality changes and listing/delisting decisions.
2.21	City of Dana Point	Pacific Ocean Shoreline, Dana Point HSA, at Dana Point Harbor Baby Beach should be delisted (Decision # 43763)	Comment noted. Delist for enterococci for REC-1; List for Total Coliform for SHELL Based on additional supporting information provided by the Orange County Public Works, a diversion was installed immediately upstream of the beach in the fall of 2005. The data from 2006 to 2010 were reassessed and the exceedance rate of enterococcus SSM was calculated to be 78/681, not exceeding the "allowable" exceedance rate per Table 4.2 of the Listing Policy. Therefore, the waterbody segment will be delisted for enterococci for REC-1. However, the exceedance rate for Total Coliform (SSM) from 2006 to 2010 was 129/681 when data were compared against the SSM criteria (i.e., 230 organisms/100 ml) for the protection of SHELL beneficial use and that exceeds the "allowable" exceedance rate per Table 4.2 of the Listing Policy. Therefore, the waterbody segment is still listed for impairment of SHELL beneficial use of Indicator Bacteria (to be specific, total coliform)
2.22	City of Dana Point	Pacific Ocean Shoreline, Dana Point HSA, at Salt Creek outlet at Monarch Beach, Copper, Malathion, and Nickel should be "Do Not List" (Decision # 49742) – ocean samples (SCM1d) and non-ocean samples (SCM-1) were combined and evaluated against Ocean Plan standard.	Agree. SCM-1 was removed from the assessment for water quality at this shoreline segment. Upon reassessment of data from station SCM-1d, the exceedance rates for copper, malathion, and nickel have been revised to one over five, zero over five, and zero over five, respectively. The listings for copper, malathion, and nickel are removed for this shoreline segment (see decisions #49742, # 49749, and #49753). LOEs based on SCM-1 data will be generated (for the protection of WARM beneficial use) under "Salt Creek (mouth)" in the next Integrated Reporting cycle.
2.23	City of Dana Point	Dana Point Harbor: Indicator Bacteria should be "Do Not List" (decision # 34003); Harbor rules	Disagree. Unfortunately the information regarding the ban on fishing within Dana Point Harbor is incorrect. For the State of California, fishing activities in waters of the United States and/or State are

		dictate “no fishing/swimming”. Shellfish Beneficial Use is inappropriately applied to this waterbody resulting in Listing decision.	regulated by the California Department of Fish and Wildlife. Dana Point Harbor has an existing public fishing pier, public jetties, and open water where fishing by the public is allowed. The referenced harbor rule against fishing is for people utilizing docks and boat slips within the Dana Point Marina, a privately held company that manages private slips within a portion of Dana Point Harbor. Dana Point Harbor has an existing designated beneficial use for SHELL according to the San Diego Water Board’s Basin Plan (1994). Unless this beneficial use is excepted or removed, water quality attainment status for the support of SHELL needs to be evaluated for Dana Point Harbor.
2.24	City of Dana Point	Pacific Ocean Shoreline, Laguna Beach HSA, at Niguel Marine Life Refuge: Mercury should be “do not list” (decision # 49724): only 3 of 5 samples referenced in LOE 74496 had actual/verified results for Mercury. No exceedances were observed for all samples.	Agree. The listing of mercury for the Pacific Ocean Shoreline, Laguna Beach HSA, at Niguel Marine Life Refuge has been removed. Decision 49724 and LOE 74496 are deleted.
2.25	City of Dana Point	Discrepancies in Fact Sheet and LOEs regarding Pacific Ocean Shoreline, Dana Point HSA, at Salt Creek outlet at Monarch Beach, Mercury decision (49751) and 48631	Agree, the listing decision of mercury was removed for Salt Creek outlet at Monarch Beach, and 49751 and 48631 were deleted.
2.26	City of Dana Point	Dana Point Harbor at Guest dock: FIB should be “do not list” (decision 49696): faulty assessment in LOE 77598	Comment noted. The Listing decision for Indicator Bacteria has been removed. Including data from 2005, the exceedance rate has been recalculated to be 18/145 for total coliform (geomean), which does not exceed the rate “allowable” in Table 3.2. However, if only 2008 to 2010 data were assessed, the resultant exceedance rate of Total Coliform for the protection of SHELL (i.e., 10 over 38) is greater than “allowed” in Table 3.2 and leads to listing. If newer data (i.e., data collected after August 30, 2010) also suggests an increasing trend of total coliform, the San Diego Water Board will consider listing this water body segment in the next assessment cycle or “off-cycle” as appropriate for the impairment of SHELL.

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2.27	City of Dana Point	Good public workshop on July 19, 2016 by staff. Thanks to Dave and Board members Eric and Tomas for attending the workshop out of busy schedules.	Comment Noted. Thanks.
2.28	County of San Diego	Water bodies located in the tributaries of the beaches and creeks currently addressed by the 20 beach/creek TMDL should be classified as Category 4a.	Agree. Water body segments covered under TMDLs have been placed to Category 4a.
2.29	County of San Diego	Sediment and water toxicity samples should not be combined to determine the final exceedance count and listing determination	Agree. Exceedance rates from different matrixes should not be directly combined without spatial and temporal considerations.
2.30	County of San Diego; National City (for Paradise Creek)	Selenium Delisting letters not considered in Draft 2014 303(d) List: In May 2014, the County of San Diego submitted five comment letters related to the 2010 §303d listings for selenium in five creeks. Additional data were collected by the County of San Diego for use in the de-listing evaluation and compared to the California Toxics Rule (CTR) Freshwater Criterion of 0.005 mg/L. The County requests that these data be considered as part of the 2014 §303(d) list development process	Comment noted. No changes made in the Report. Pursuant to the State Board's directive, as stated in the memo letter dated November 12, 2013, newer data submitted after the cutoff date of August 30, 2010, including the Selenium Delisting letters submitted by the commenter, were not included in the 2014 cycle of Integrated Report assessment. The delisting requests will be considered as high priority in the next cycle of Integrated Report assessment. This pollutant may be addressed during an off-cycle update with consideration of San Diego Water Board priorities and available resources.

2.31	County of San Diego	Many Nitrogen Listings that show less than four exceedances over (less than) four samples are wrong per Table 3.2 of conventional pollutants.	Disagree. Section 3.7.1 of the Listing Policy requires that nitrogen and phosphorus be assessed in accordance with Table 3.1, which states that for cases of two exceedances over equal to or less than five samples, the quality of water body segment in evaluation does not meet water quality standards and does not support the beneficial use in evaluation. In the 2008/2010 cycle, the evaluation of nitrogen and phosphorous using Table 3.2 was wrong, and this mistake has been corrected in the 2014 assessment. This fact was also explained in the footnote #7 on Page 23 of the draft Integrated Report.
2.32	County of San Diego	Many Phosphorus Listings that show less than four exceedances over (less than) four samples are wrong per Table 3.2 of conventional pollutants.	Disagree. See responses to Comment No. 2.31.
2.33	County of San Diego; Cities of Vista and Oceanside.	Agua Hedionda Creek / MBAS (decision # 47481): faulty assessment; also see the Cities' comments (page 2)	Agree. Data were re-assessed and the correct exceedance rate is zero out of 28. Listing of MBAS for Agua Hedionda Creek is removed.
2.34	County of San Diego	Escondido Creek / MBAS (decision # 47747): faulty assessment	Agree. Data were re-assessed and the correct exceedance rate is zero out of 27. Listing of MBAS for Escondido Creek is removed.
2.35	County of San Diego	San Diego River (lower) / MBAS (decision # 51367): faulty assessment	Agree. Data were re-assessed and the correct exceedance rate is one out of 19 (submitted data of samples collected between November 2001 and November 2008 were included in the assessment). Listing of MBAS for San Diego River (lower) is removed.
2.36	County of San	Los Penasquitos Creek / Chlorpyrifos (decision # 47517):	Comment noted. Listing decision for Los Penasquitos Creek/Chlorpyrifos remains unchanged. The

	Diego	data showing exceedances were collected in 2002, those data do not correlate to samples showing toxicity; newer data don't show exceedances and the trend evaluation suggests they will not exceed the criterion in future cycle; suggest remove the listing.	association between toxicity and Chlorpyrifos was removed. Data collected after August 30, 2010, will not be included in this cycle of assessment in accordance with the State Board directive. Newer data will be included in the next regularly scheduled cycle (or "off-cycle") assessment as appropriate
2.37	County of San Diego; National City	Sweetwater River(Lower) / Chlorpyrifos (decision # 53457): data used for listing is too old; if including more recent data (e.g., after August 30, 2010), then the exceedance/total # of samples will be less than required in Table 3.1; newer data don't show exceedances and the trend evaluation suggests they will not exceed the criterion in future cycle; suggest remove the listing. In National City's comment: sites 909SWT01 through 03 and 909SWT05 show zero of 18 samples exceed the criterion (data provided in attachment, see more comments on page 2)	Comment noted. Listing decision for Sweetwater River (lower)/Chlorpyrifos remains unchanged. Data collected after August 30, 2010 will not be included in this cycle of assessment in accordance with the State Board directive. Data collected afterwards will be included in the next cycle (or "off-cycle") assessment when the delisting request for Sweetwater River (lower)/chlorpyrifos will be evaluated. Please make sure that data of stations 909SWT01 through 03, and 909SWT05 are submitted into CEDEN in order to be included in the next cycle (or "off-cycle") assessment as appropriate.
2.38	County of San Diego	The listing of Escondido Creek/Malathion (47742) should be removed: newer data (up to 2014) shows less exceedances than "allowable" number of	Comment noted. The listing decision for Escondido Creek/Malathion remains unchanged. The association between toxicity LOEs and malathion listing is removed. Pursuant to State Board directives, newer data collected after August 30, 2010 are not included in the 2014 cycle of Integrated Report assessment. The delisting request and associated newer data

		exceedances per Table 3.1; no association between toxicity data and malathion concentration data; see more discussion in Comment letter (page 9)	will be considered with high priority in the next cycle (or "off-cycle") assessment as appropriate. As toxicity was not observed in the samples that exceed the water quality criterion for malathion, the toxicity LOE has been dissociated from the Listing decision of Escondido Creek/Malathion.
2.39	County of San Diego	Santa Margarita River (Lower) / Toxicity (43103): Data collected from the SM lagoon should not be included for the subject water body segment; see more discussion in comment letter (page 10)	Agree. LOEs 76545 and 72834 have been dissociated from Decision #43103. Replacements of these two LOEs (95679 and 95680) have been linked with Decision #48149 for "Santa Margarita Lagoon." Toxicity information regarding both water column and sediment matrixes should be evaluated and presented under the same "Toxicity" decision for the same water body segment.
2.40	County of San Diego	San Diego River (Lower) / Toxicity (51375): Data collected from the Estuary should not be included for the subject water body segment; faulty assessment, see more comments in letter (page 10)	Comment noted. No changes made in the Report. As the San Diego River (lower) will be listed for (water) toxicity, and the San Diego River Estuary has not been separated from San Diego River (lower) in CalWQA, San Diego River Estuary and associated stations were included in the assessment for San Diego River (lower) in this cycle of assessment. In the next assessment ("off-cycle" if appropriate), the San Diego River Estuary will be separated from the lower portion (i.e., freshwater) portion of San Diego River (lower). The following sentence has been added to Decision 51375 to clarify that the listing for (sediment) toxicity is for the Estuary portion: "Up to this time of assessment, sediment toxicity has been observed mostly in samples from the San Diego River Estuary. "
2.41	National City	Newer data (after 2010) suggest the listing of selenium for Paradise Creek should be	Comment noted. The listing decision for Selenium remains unchanged. Note that pursuant to the State Board's directive, data collected after August 30, 2010 are not included in the 2014 cycle of assessment. The delisting request and associated newer data, as

		removed	presented in the comment letter, will be considered with high priority in the next cycle (or "off-cycle") assessment as appropriate.
2.42	National City	The listing of phosphorus for Paradise Creek should be removed because in last cycle, it was concluded not to be listed, and no new data has been collected.	Comment noted. The listing decision for phosphorus remains unchanged. Note that Decision 16949 is not correct as Section 3.7.1 of the Listing Policy clearly states that nitrogen and phosphorus should be evaluated using Table 3.1, not Table 3.2. According to Table 3.1, the exceedance rate of four over four justifies placing the water segment on the impairment list for phosphorous. Additional data are needed to delist this water body.
2.43	NRG/Cabrillo Power I LLC	Agua Hedionda Lagoon Toxicity: revise decision 47577 to 3 exceedances over eight samples; revise LOE 72914 to two exceedances over three samples.	Agree. Revisions were made to the affected LOE and decision as requested by the commenter.
2.44	NRG/Cabrillo Power I LLC	Agua Hedionda Lagoon Toxicity: newer data (2013 data) show no toxicity of sediment samples collected in the lagoon; recent banning of certain pesticides and implementation of storm water program may have helped to improve water quality with respect to toxicity; The lagoon is composed of three portions that are of different physical characteristics and should be split as appropriate.	Comment noted. List <u>eastern</u> Agua Hedionda Lagoon for toxicity. The San Diego Water Board agrees that the Agua Hedionda Lagoon (AHL) should be split into multiple waterbody segments. Based on the available data, AHL has been split two portions, with the outer and the middle lagoons as one portion (western AHL) and the inner lagoon as a separate portion (eastern AHL). Section 6.1.5.4 of the Listing Policy requires the Regional Board to "identify stream reaches or lake/estuary areas that may have different pollutant levels based on significant differences in land use, tributary inflow, or discharge input" and aggregate the data by appropriate reach or area. The splitting of the AHL to two portions is based on the greater tidal flushing at the outer and middle lagoon compared to the inner lagoon and different water chemistry characteristics observed in the two portions. Note that the 2014 cycle of assessment only includes data collected prior to August 30, 2010. Therefore, the Bight 2013 data is not eligible to be included in this cycle of assessment. However, even if the Bight 2013 sediment data were included with the pre 2010 data, the final exceedance rate of toxicity in the eastern AHL will be **three over ten**, justifying placing the eastern AHL on the

			303(d) list for toxicity impairment. As a result, the AHL is split into the western and the eastern sections, and only the eastern AHL will be placed in Category 5 for toxicity impairment.
2.45	City of Vista and Oceanside	Selenium Standard misapplied: 40 CFR 131.38 clearly states that the criterion for selenium applies only to total selenium, not dissolved selenium. Therefore, the dissolved selenium samples included in the listing assessments should not be used. The impacted water body segment include: Agua Hedionda Creek (33134); Buena Vista Creek (42422); Loma Alta Creek (43254) See additional details of discussion in comment letter (page 3-5)	Comment noted. The referenced section of 40 CFR states that the criteria applies to total recoverable Selenium. It is true that in LOE3183, 6549, and 8875, dissolved Se was reported (from CEDEN). However, considering that total recoverable Se is composed of both dissolved Se and particulate Se, total Se concentrations for these samples will, at a minimum, be equal to total recoverable but likely will be greater, especially in turbid conditions (particulate Se for these samples is likely low as shown by the turbidity sample results). Thus, any exceedance rate of dissolved Se will result in the exceedance of total Se. Thus the exceedance rates of dissolved Se have been considered is these decisions as conservative estimates for the total Se. Agua Hedionda Creek/ Se: Listing decision remains unchanged. Buena Vista Creek/Se: Listing decision remains unchanged Loma Alta Creek/Se: Listing decision remains unchanged For Agua Hedionda Creek, after considering the exceedance rate in LOE 77975, the final exceedance rate is calculated to be four over 29 in decision 33134, justifying placing the water segment for Se impairment. Data were re-evaluated and exceedance rates in LOE6549 and LOE 8875 should be 4 over 4, not 3 over 3. This change will be made in the next assessment cycle (potentially "off-cycle"). The final exceedance rate for Se in Buena Vista Creek and Loma Alta Creek should be four over eight, justifying placing the water segments on impaired list for Se.
2.46	City of Vista and Oceanside	Pacific Ocean Shoreline/Loma Alta HSA/Loma Alta Creek Mouth (43811) and Pacific Ocean Shoreline/San Luis Rey HU/San Luis Rey River Mouth (44090): both of the water body	Comment noted. It is the Regional Board's understanding that no LOEs on SHELL have been generated for Pacific Ocean Shoreline/Loma Alta HSA/Loma Alta Creek Mouth (Decision 43811) in the 2014 IR assessment. Such an LOE(s) will be added to the database in next cycle (or "off-cycle") as

		segments do not have designated beneficial use for shellfish harvesting per Basin Plan (Table 2-3), and so the LOEs for SHELL for these two water body segments should be removed.	appropriate. With respect to Pacific Ocean Shoreline/San Luis Rey HU/San Luis Rey River Mouth (Decision 44090), note that FIB data were collected from beach stations located in the pacific ocean, not in the brackish water segment east of the sand bars, and are subject to the beneficial use designations for Pacific Ocean, including SHELL. As a result, the LOEs on SHELL remain unchanged.
2.47	Orange County Public Works	Multiple listings for Pacific Ocean Shoreline sites are based on lines of evidence (LOEs) and use data collected from sampling stations that are not associated with these sites. These data should not be used to evaluate these sites, and associated LOEs should be deleted. The affected listing decisions (See also Appendix A and B) are tabulated on page 2 for the list of waterbody/pollutant combinations	Comment noted. **Pacific Ocean Shoreline at Aliso Creek Mouth / Indicator Bacteria (Decision 43047)–** LOEs about Station ACM-1, i.e. 30623, 30625, 30614, 30616, 30619, and 30620, were dissociated with Decision # 43047 (these LOEs will be linked to Decision #34761 in the next cycle). LOEs for Station C1 remain associated as the GPS coordinate of the sampling station corresponds to west of the sandbar and close to the shoreline. Re-assessment of data results in an exceedance rate of 97 out of 223 for geomean concentrations of enterococci between January 1999 and December 2009. The decision for this water body segment remains "do not delist." **Pacific Ocean Shoreline at Aliso Creek Mouth / Toxicity (Decision #49665)** – ACM-1 is removed from LOE 74553. Listing decision remains unchanged. **Pacific Ocean Shoreline, Lower San Juan HSA, at North Beach Creek/ Indicator Bacteria (Decision 43790)**: LOEs associated with Stations DSB5 and BW622 were dissociated from Decision 43790. **Pacific Ocean Shoreline, lower San Juan HSA, at North Doheny state Park Campground /Indicator Bacteria (Decision 43665)**: Decision remains unchanged. The GPS information of the stations included in the assessment were re-evaluated, BW 946 and BW 942 are found to be within 200 meters from DSB4 (up and down surf zone), and are appropriate to be included in decisions for 43665. **Pacific Ocean Shoreline, Laguna Beach HSA, at Broadway Creek / Indicator bacteria (Decision 49808)**: Listing decision remains unchanged. Based on the GPS information submitted together with Beach Water data, the station (BW616) is located along the shoreline in the ocean (33.541950, -117.785434), and so is appropriate to be included in the assessment for 49808.

			Aliso Creek / Selenium (43129): Listing decision remains unchanged. LOE 9076 (should be revised, with exceedance rate of 0 over 4), was dissociated with 43129, should be linked to Decision 47596. **Aliso Creek / Toxicity (46397):** Listing decision remains unchanged. LOE 21397 was dissociated with 46397 and should be linked to Decision 62899. At this time, this link will not be present in CalWQA as it involves re-mapping of the water body segments. This will be done in the next cycle or "off-cycle" as appropriate. **Pacific Ocean Shoreline, Lower San Juan HSA, at San Juan Creek (49848)** – Was changed to "Do Not List" and corresponding LOE (75013) was updated to only include SJC-1d. **Pacific Ocean Shoreline, Lower San Juan HSA, at San Juan Creek (49852)** – Was changed to "Do Not List," and corresponding LOE (75067) was updated to only include SJC-1d.
2.48	Orange County Public Works	A large number of BMPs, including multiple sewer diversions, were implemented after 2005. Therefore, it is inappropriate to evaluate data from prior to 2006 to represent water quality for the 2014 list. See the table on page 3 for the list of affected waterbodies/pollutants.	**Pacific Ocean Shoreline at Aliso Creek Mouth / Indicator Bacteria (Decision 43047):** The decision for this water body segment remains to be "do not delist." Since 2003, Orange County Public Works (OCPW) has installed many structural BMPs including wetland restoration projects upstream in the watershed to control storm water runoff. Based on additional supporting information provided by OCPW, many of these projects were installed between 2006 and 2008 with some projects not completed until 2011. As the 2014 cycle of assessment only includes data collected up to December 2009 at the subject site, the San Diego Water Board staff considers it prudent to wait until the next cycle of assessment when more recent data are available to evaluate whether those BMPs have been effective to improve water quality downstream at the subject beach. The decision for indicator at this water body segment remains to be "Do not delist." **Pacific Ocean Shoreline at Aliso Beach – Middle / Indicator Bacteria (Decision 43112)**: This decision is carried over from 2008 to 2014 because no new data were submitted to the State Board during the Solicitation Period. Also see responses above to comments regarding 43047. Decision remains unchanged.

			Pacific Ocean Shoreline, Laguna Beach HSA, at Main Beach / Indicator Bacteria (Decision 44695): Data collected after the installation of two diversions were reassessed, and the resultant exceedance rate of geomeans of total coliform samples is zero of 17 during the AB411 period, meeting the delisting criteria. This water body segment has been delisted for Indicator Bacteria. **Pacific Ocean Shoreline, Dana Point HSA, at Dana Point Harbor at Baby Beach / Indicator Bacteria (decision 43763**): the listing decision for indicator bacteria remains unchanged. Based on additional supporting information provided by the Orange County Public Works, a diversion was installed immediately upstream of the beach in the fall of 2005. Data from 2006 to 2010 were reassessed and the exceedance rate of enterococcus SSM was calculated to be 78/681, not exceeding the "allowable" exceedance rate per Table 4.2 of the Listing Policy. Therefore, the waterbody segment will be delisted for enterococci for REC-1. However, the exceedance rate for Total Coliform (SSM) from 2006 to 2010 was 129/681 (data compared with a SSM of 230 organisms/100 ml) for the protection of SHELL beneficial use and that exceeds the "allowable" exceedance rate per Table 4.2 of the Listing Policy. Therefore, the waterbody segment is still listed for impairment of the SHELL beneficial use of Indicator Bacteria (to be specific, total coliform). **Pacific Ocean Shoreline, San Clemente HA, at San Clemente City Beach, North Beach /Indicator Bacteria (Decision 43328):** This decision is carried over from 2008 to 2014 because no new data for Station S17 were submitted to the State Board during the Solicitation Period. Data pertaining to Decision 43328 were up to December 2007. Newer data, together with the information regarding diversions installed upstream, will be evaluated in the next cycle or "off-cycle" as appropriate. **Arroyo Trabuco Creek / Diazinon (Decision 42259):** Decision revised to "Delist". See additional information in responses to comment #1.22. **San Juan Creek / Malathion (Decision 48964): Decision remains unchanged.** Malathion data at station SJC-1 has been included in LOE 95662 for San Juan Creek Mouth. At the station, one sample was collected in 2006 and four samples were collected in 2007 and 2008, and the exceedance rate for Malathion (0.1 ug/L for marine aquatic life protection) is one over five, which is insufficient to list the waterbody as impaired per Table 3.1. In future assessment, the effect of the diversion will

			(only) be evaluated on data collected in dry weather.
2.49	Orange County Public Works	Pacific Ocean Shoreline, Lower San Juan HSA at surf zone outfall at Doheny State Beach (4987Z) and Pacific Ocean Shoreline, Laguna Beach HSA, at Broadway Creek (49808) for FIB are already included in the Bacteria TMDLs. Creating additional listings in an area already covered by a TMDL is unnecessary.	Comment noted. New listings are necessary, only categories have been changed. Categories for affected water body segments discussed in this comment have been changed to 4a.
2.50	Orange County Public Works, City of San Juan (for Arroyo Trabuco Creek)	The Basin Plan does not have a WQO for total coliform in freshwater beaches for the protection of REC-1 beneficial use. The criterion of draft guidance from CDPH has not been finalized. Therefore, LOEs using such criterion for total coliform in fresh water beaches should be removed. See the lower table on page 3 for the list of inland surface water bodies affected.	Agree. LOEs on total coliform for inland surface waters including Laguna Canyon Channel, Cristianitos Creek, Segunda Deshecha Creek, Prima Deshecha Creek, San Juan Creek, Arroyo Trabuco Creek and Aliso Creek were removed from their respective decisions. LOEs on total coliform for other inland surface waters will be removed as appropriate in next cycle.
2.51	OC public works; City of San Juan (for San Juan Creek)	Potential Faulty Assessment: Multiple new listings for mercury refer to data sets where mercury was either not detected or not analyzed.	Agree. Listings for mercury have been removed for Arroyo Trabuco Creek (47807 changed to 63087), Bell Canyon Creek (47986), San Juan Creek (49000, revised to be 0/1), Dana Point at Niguel Marine Life Refuge (49724), Salt Creek outlet at Monarch Beach (49751), Salt Creek (48631), Segunda Deshecha

		Samples where mercury was detected were well below the Ocean Plan marine water quality objective of 0.04 ug/L. OC Public Works mass emissions and bioassessment data from 2006-16 do not show a single exceedance for mercury for any of these sites. Listings for Arroyo Trabuco Creek (47807), Bell Canyon Creek (47986), San Juan Creek (49000), Dana Point at Niguel Marine Life Refuge (49724), Salt Creek outlet at Monarch Beach (49751), Salt Creek (48631), Segunda Deshecha Creek (49468) and Prima Deshecha Creek (48508) and associated LOEs (73009, 73052, 74496, 75134, 75494, 75512, 75557, 75948 and 76719) are therefore erroneous and should not be considered.	Creek (49468) and Prima Deshecha Creek (48508).
2.52	Orange County Public Works	The listing decisions for cadmium, nickel, and copper in Cristianitos Creek, Segunda Deshecha and Prima Deshecha Creek use data that do not appear to be hardness adjusted as required under the California Toxics Rule, despite the fact that	Comment noted. **Segunda Deshecha / Cadmium (Decision 49444), Nickel (Decision 49454), and Copper (Decision 49449):** The data were reassessed, corrected for hardness, and revised to "Do Not List." **Cristianitos Creek / Nickel (Decision 48374):** The data were reassessed, corrected for hardness, and revised to "Do Not List."

		hardness data were provided in the referenced dataset. Targets should be adjusted by hardness and the dataset should be re-evaluated accordingly. The affected listing decisions are 48375, 48374, 49444, 49449, 49454, 36180, and 43494.	**Cristianitos Creek / Cadmium (Decision 48375):** Decision 48375 was not changed, as the initial assessment was done with hardness adjustments (7/13 exceedances is correct). **Prima Deshecha Creek / Cadmium (Decision 36180):** The data were reassessed, but the decision remains the same. LOE 75482 was updated to reflect the correct number of samples (7-day time periods were averaged, and hardness adjustments were made). The decision remains the same, as the 2006-2009 data resulted in 4/9 exceedances. **Prima Deshecha Creek / Nickel (Decision 43494):** The data were reassessed, and Decision 43494 was changed to "Delist from 303(d) list." The San Diego Water Board will work with the State Board to update older LOEs, which were not hardness adjusted during the initial assessments. LOE 7740 should have 1/10 exceedances (averaged over 7 days and hardness adjusted). LOE 75495 should have 0/9 exceedances (averaged over 7 days and adjusted for hardness). Copper was not identified for Listing for Prima Deshecha or Cristianitos.
2.53	Orange County Public Works	Aliso Creek (mouth)/arsenic (47590): this decision should be removed because MUN is not applicable for this water body segment.	Agree. The listing decision for Aliso Creek (mouth)/arsenic (61526) has been removed.
2.54	Orange County Public Works	San Juan Creek/Selenium (43131): data citation link should go to "Ref2618." In addition, there are 2 San Juan Creek stations in the reference dataset but only one station is included in the evaluation. After re-evaluating this listing using both stations, the exceedance rate for this LOE should be 2/8 instead of 2/4	Agree. Decision 43131 remains "Do Not Delist." LOE 9096 should state 2 of 8, bringing the total of the grouped LOEs to 5 of 27. Decision 43131 has been revised to reflect this change. LOE 9096 is now archived and inaccessible for editing at this time. The San Diego Water Board will work with State Board to correct LOE 9096 (including correct the data link to Ref2618) in the next cycle.
2.55	Orange County Public	For the list decisions for metals and pesticides in Dana Point	Comment noted.

	Works	Harbor, Prima Deshecha Creek and Segunda Deshecha Creek, toxicity LOEs are being used in support of a metal or pesticide listing. There is no evidence to show that they are directly linked. Total sample exceedance numbers are inflated due to the inclusion of exceedances from toxicity samples, which adversely affected the listing decision. Moreover, historical toxicity data can have credibility issues: A preliminary lab intercalibration study results for toxicity conducted by Southern California Coastal Water Research Project (SCCWRP) shows the results among labs have poor comparability for two fresh water species (Ceriodaphnia dubia and Hyalella azteca). Therefore, the following listings should be re-evaluated: 42746 for Zinc, 43226 and 49449 for copper, 36180 and 49444 for cadmium, 43494 and 49454 for nickel, 48508 for Mercury, 49459 for selenium and 48507 for malathion.	Decisions listed in this comment were re-examined and the conclusions for each decision are listed below. Note that as long as labs follow appropriate QA/QC procedures in their toxicity tests, the San Diego Water Board will not discredit sample results that show toxicity, unless additional information is available showing that those toxicity results are false positives. **Dana Point Harbor / Zinc (Decision 42746):** Decision remains "Do Not Delist." Based on 2010 data, 2/19 exceedances of zinc in sediment results in a listing. **Dana Point Harbor / Copper (Decision 43226):** Decision remains "Do Not Delist." Based on water data and not toxicity, it would remain listed. **Segunda Deshecha Creek / Copper (Decision 49449)**: Data were reassessed, corrected for hardness, and the decision was revised to "Do Not List." No water or sediment exceedances in samples. **Prima Deshecha Creek / Cadmium (Decision 36180):** Decision was based on water samples, and remains unchanged. **Segunda Deshecha / Cadmium (Decision 49444):** Data were reassessed, corrected for hardness, and the decision revised to "Do Not List." **Prima Deshecha Creek / Nickel (Decision 43494):** Decision changed to "Delist" due to incorrect initial assessment (was not hardness adjusted) **Segunda Deshecha / Nickel (Decision 49454):** Decision changed to "Do Not List" due to incorrect initial assessment (was not hardness adjusted). **Prima Deshecha Creek / Mercury (Decision 48508)**: Decision remains unchanged. Water data alone justifies listing decision (27/27 exceedances). **Segunda Deshecha Creek / Selenium (Decision 49459):** Decision remains unchanged. Water data alone justifies listing decision (11/18 exceedances). **Prima Deshecha Creek / Malathion (Decision 48507)**: Decision remains unchanged. Water data

			alone justifies listing decision (6/25 exceedances).
2.56	Orange County Public Works	All of the OC Public Works data should be considered consistently in the listing process. After the OC Public Works samples at station EC-MD were taken into account for the total nitrogen analysis at English Canyon (Decision ID 42811), the actual exceedance rate should be 2/9 instead of 2/4 as indicated in the factsheet resulting in a "Do not list'' decision. Therefore, listing 42811 should be removed and the following listing IDs should be re-evaluated by applying a consistent approach when including OC Public Works data: 34545, 42917, 47816, 42285, 34172, and 41422	Comment noted. Decisions listed in this comment were re-assessed and the results are provided below: **English Canyon / Total Nitrogen (Decision 42811):** Decision remains "list on 303(d)." The exceedance count for station EC-MD is 1/6, making the total count 3/10, justifying the listing decision. The decision was edited to use table 3.1 (instead of 3.2). The count was kept at 2/4 until a new LOE is created next cycle. **Aliso Creek / Nitrogen (Decision 42917):** Decision remains "list on 303(d)." Re-evaluation does not change the decision; exceedance count is 36/37 (instead of 12/13) if data is included from Station ACJ01, AC-CCR, and AC-PPD. The decision was edited to use table 3.1 (instead of 3.2). **Arroyo Trabuco Creek / Nitrogen (Decision 42285):** Decision remains "list on 303(d)." Re-evaluation does not change the decision; exceedance count is 15/32 (instead of 8/9) if data is included from Stations TCOL02, TC-AP, TC-DO, REF-TCAS, and SMC00206. The decision was edited to use table 3.1 (instead of 3.2). **Aliso Creek / Phosphorus (Decision 34545):** Decision remains "Do not delist." Re-evaluation does not change the decision; exceedance count is 37/37 (instead of 13/13) if data is included from Stations ACJ01, AC-CCR, and AC-PPD. **Arroyo Trabuco Creek / Phosphorus (Decision 34172):** Decision remains "list on 303(d)." Re-evaluation does not change the decision; exceedance count is 22/32 (instead of 9/9) if data is included from Stations TCOL02, TC-AP, TC-DO, REF-TCAS, and SMC00206. **San Juan Creek / Indicator Bacteria (Decision 41422):** Decision remains "Do not delist." FIB data for stations REF-CS and SJC-CC were not available in Ref. 3871, it is not clear if samples were analyzed for FIB at those stations. Station SJC-74 (i.e. Ortega Highway) data were already included in the evaluation. Decision remains unchanged. **Arroyo Trabuco Creek / Indicator Bacteria (Decision 47816):** Decision remains "List on 303(d)." No indicator bacteria data are available in the reference data for stations REF-TCAS, TC-DO, TC-AP, and

			SMC00206. It's not clear if samples at these stations are analyzed for FIB. Decision remains unchanged. **Segunda Deshecha Creek / Phosphorus (Decision 34533):** Decision remains "Do Not Delist." Re-evaluation does not change the decision; exceedance count is 24/25 (instead of 3/4) if data is included from Stations SDCM02 and SD-AP, and if LOE 7762 is corrected (to 11/12 instead of 3/4). **Segunda Deshecha Creek / Turbidity (Decision 34534):** Decision remains "Do Not Delist." Re-evaluation does not change the decision; exceedance count is 5/14 (instead of 0/1) if data is included from Stations SDCM02 and SD-AP. **Segunda Deshecha Creek / Nitrogen (Decision 43140):** Decision remains "List." Re-evaluation does not change the decision; exceedance count is 22/25 (instead of 3/4) if data is included from Stations SDCM02 and SD-AP, and if LOE 7763 is corrected (to 9/12 instead of 3/4).
2.57	Orange County Public Works	San Juan Creek/DO (49033): The total number of samples and exceedance counts derived from different water quality objectives were added together as evidence for the listing. An evaluation using OC Public Works data from 2006-10 by comparing against the more stringent target used in this listing (no less than 6 mg/L) indicates that the exceedance rate is 7/141. Thus this water body should not be listed for DO.	Comment noted. Decision remains unchanged. The "readily available data" that was provided was reassessed, which is only 40 samples total (any samples collected within 7 days of one another were averaged): LOE 75956 was corrected to 0/2 exceedances. LOE 75958 was corrected to 4/21 exceedances. The total became 12/40 exceedances, which still results in listing the water body. It is not clear to the San Diego Water Board staff what additional data have been used to arrive at the exceedance rate of 7/141. Any data that was not included in the Regional Board's assessment will be considered in the next assessment cycle or "off-cycle" as appropriate. In addition to submitting the data in CEDEN, for this particular decision, it'll be helpful if the commenter also submit an electronic copy of data to the San Diego Water Board.
2.58	Orange County Public Works	Some data submitted before the State Board cutoff date were not included in the assessment: these records include: Aliso	Comment noted. The data that were assessed in the 2014 assessment were submitted between January 14 through August 30, 2011. For some decisions, e.g., 34761, no new data were updated under this decision

		Creek (mouth)(34761), Aliso Creek(42917, 34545), San Juan Creek(43657, 32893), San Juan Creek Mouth(34549), Dana Point Harbor(34003, 43763,49696,49699), Poche Beach(44202), North Beach(43328),Segunda Deshecha(49566), and San Clemente City Beach at Pier (42681). An evaluation for those listings has been completed As shown in Appendix B attached to this comment letter.	because station data were evaluated under other decisions (for Pacific Ocean Shoreline, Aliso Creek mouth). As presented in previous responses, the San Diego Board staff have made corrections and revisions to LOEs and decisions (including 34761) as appropriate based on the comments received. After re-assessment, no revisions were made to decisions # 49699 and 42681 as data assessment presented in relevant LOEs appear to be correct. At this time, it is not clear to the San Diego Water Board staff which additional data were not included in the assessment. For example, comments contained in Appendix B regarding Decision #44202 are not clear about the additional data. Along the same thought, the data that were submitted during the solicitation period do not contain FIB data for the inland station at the San Juan Creek mouth (i.e., SJC-1), and so no new LOEs were generated for that station and included in Decision 34549. In the interest of time, any data that were not included in this assessment will be included in next cycle (or "off-cycle") assessment as appropriate. Please make sure these additional data were submitted in CEDEN. Additionally, for decisions 44202 and 34549, it'll be helpful that the commenter also directly sends an electronic copy of the data that it would like to be included in future cycle of assessment to San Diego Water Board.
2.59	Orange County Public Works	Editorial errors: see table on page 5 for the list of editorial errors and proposed changes.	Comment noted. Editorial changes are made as appropriate.
2.60	Port of San Diego	Decision ID 52947 LOE ID 75595 San Diego Bay - Arsenic (Shellfish Tissue): The data analysis methodologies utilized to calculate inorganic arsenic and the spatial assumptions made with the inclusion of data from only two sampling locations may not appropriately estimate inorganic arsenic	The San Diego Water Board has reviewed the Decision and Line of Evidence and agrees with the comment that there is a high level of uncertainty in the levels of inorganic arsenic in shellfish tissue. The assumption regarding the percent of total arsenic in shellfish tissue is likely conservative, and the San Diego Water Board agrees that a listing based on those assumptions has a high probability of mischaracterizing the results as an impairment. The San Diego Water Board supports the Port's suggestion that future monitoring of shellfish incorporate a measurement of both total and inorganic arsenic.

		concentrations and therefore incorrectly categorize the entire waterbody. See more details in the comment letter	
2.61	Port of San Diego	Indicator Bacteria Levels at Tidelands Park along the San Diego Bay Shoreline have improved over time and in addition are being actively addressed through the San Diego Bay Water Quality Improvement Plan (WQIP). It is recommended that this listing be re-categorized from Category 5 Waterbody Segments (Appendix B) to Category 4B Waterbody Segments (Appendix D). See details in the comment letter	Comment noted. The listing decision for Indicator Bacteria at Tidelands Park of San Diego Bay shoreline remains unchanged. Pursuant to the State Board's directive, newer data collected after August 30, 2010 were not included in the 2014 cycle of Integrated Report assessment. The delisting request with supporting data presented in the attachment by the commenter will be reviewed with high priority in the next cycle (or "off-cycle") assessment as appropriate.
2.62	Port of San Diego	The commenter requests removal of the Mercury (tissue) listing under Decision ID 33669 LOE ID 80842: discrepancies, see details in the letter	Agree. The San Diego Water Board has created a new LOE and linked the Mercury LOE (95630) to the more appropriate Decision (53136). For additional clarification a section on fish consumption advisories and impairment listings has been added to the integrated report.
2.63	San Diego District Water Authority	The nitrogen listings for Miramar Reservoir, San Vincente, and Lake Murray should be removed. See details in the comment letter.	Comment noted. The San Diego Water Board has reviewed the rational provided by the San Diego County Water Authority for the removal of Miramar, Murray, and San Vicente reservoirs from the 303(d) list for total nitrogen related listings. The comment letter provides rationale to remove the listings based on 1) Assumptions regarding the Basin Plan Objective for Nitrogen and 2) Monitoring data related to the absence of biostimulation.

			The San Diego Water Board does not agree with the comments regarding improper assumptions and the San Diego County Water Authority's comments on required implementation actions and considerations by the San Diego Water Board related to the Basin Plan Objective for total Nitrogen. A process for site-specific interpretation for reservoirs has already been outlined and carried out within the San Diego Region. The San Diego Water Board has reviewed the data and information submitted by the San Diego County Water Authority from this reporting cycle and has concluded that, pursuant to Sections 4.11 of the Listing Policy, the waterbodies do not warrant listing as impaired for total nitrogen related to biostimulation as specified in the Basin Plan: "Inland surface waters, bays and estuaries and coastal lagoon waters shall not contain biostimulatory substances in concentrations that promote aquatic growth to the extent that such growths cause nuisance or adversely affect beneficial uses." As site-specific criteria have not been developed for all reservoirs in the San Diego Region, the San Diego Water Board evaluated the situation-specific weight of evidence provided by the San Diego County Water Authority (section 4.11 of the Listing Policy). These included: - Evidence regarding phosphorous as a limiting nutrient. This data is already in the record. - Turbidity data for the reservoirs in the form of Secchi disk readings as provided in the comment letter - Chlorophyll a concentrations in the reservoirs above the natural hypolimnion Cumulatively these data present a weight of evidence that indicates the reservoirs should not have been listing during the prior reporting cycle(s). Thus delisting the reservoirs is warranted as there was no evidence of biostimulation.

			While the data submitted by the commenter does provide a weight-of-evidence for delisting and/or not listing, it should be noted that pursuant to Section 6.1.5.3 of the Listing Policy, available data from the current and past Integrated Report cycles is not temporally representative of current conditions within these reservoirs. Thus, while the weight-of-evidence supports not listing or de-listing, there is insufficient information available to properly assess the **current** condition of these reservoirs during this reporting cycle. In 2007, as a result of the reservoirs' imported source water, Dreissenid mussels ("quagga") were introduced, resulting in drastic changes in reservoir ecosystems and management, including the drafting of management response plans in 2009. The impact of Dreissenid mussels on reservoir ecosystem dynamics, especially nutrient pools and cycling, is dramatic and well documented in the scientific literature, with mussels completely altering the physical, chemical, and biological processes within systems. Impacts of Dreissenid mussel colonization can vary depending on reservoir dynamics, but typically results in the stripping of nutrients from the phytoplankton and promotion of macrophytes due to increased water clarity. Thus, data collected prior to Dreissenid introduction and management for listing purposes should be considered insufficient to warrant continuation of impairment listings and/or determination of new listings for nitrogen, pH, and color. These pollutants should be re-assessed during future cycles (or "off-cycles") as appropriate when data is available.

References

City of San Diego. 2015. Investigation of Total Dissolved Solids Impacts on Freshwater Benthic Macroinvertebrate Communities in the San Diego Region. Prepared for City of San Diego Transportation and Storm Water Department, submitted by Amec Foster Wheeler. April 2015.

Mazor, R.D., Rehn, A.C., Ode, P.R., Engeln, M., Schiff, K.C., Stein, E.D., Gillett, D.J., Herbst, D.B. and C.P. Hawkins. 2016. Bioassessment in complex environments: designing an index for consistent meaning in different settings. *Freshwater Science* 35(1): 249-271.