



State of Oregon Department of Environmental Quality
Integrated Report Improvements
Response to Work Group Comments

Contact: Becky Anthony
Water Quality Standards and Assessments
503-229-5696 or 800-452-4011

The Integrated Report Improvements Work Group was convened in August 2017. Members of the work group were composed of a cross-section of stakeholders tasked with reviewing methodology improvement for DEQ's Integrated Report. The work group completed review of methodology white papers in March 2018.

Work group participants that submitted written comments are listed in Section 1.2. Each panelist is identified by a number. All remarks, observations or recommendations were extracted from the review form for each work group member. Comments that addressed the same issue were grouped and a common response was given to address the comment. Unique comments were answered individually. A summary of all comments submitted and DEQ's response is presented in Section 2.

Section 1.2 List of Work Group members and affiliation

1. Nina Bell; Northwest Environmental Advocates
2. Michael Campbell; Stoel Reeves
3. Mary Anne Cooper; Oregon Farm Bureau
4. Heath Curtiss; Oregon Forest Industries Council
5. Jill Fullagar; USEPA Region 10
6. Lauren Goldberg; Columbia Riverkeeper
7. Raj Kapur; Association for Clean Water Agencies
8. Ashley Russell; Confederated Tribes of the Coos, Lower Umpqua and Siuslaw Indians
9. Kathryn Van Natta; Northwest Pulp and Paper
10. Chris Zell; USEPA Region 10

Section 2 Detailed Summary of Specific Comments and Responses

Section 2.1 Key to Detail Comment Summaries

Comments and responses are compiled in tabular form in Section 2.2.

Column 1: Comment number. Consist of two numbers separated by a period. The first number corresponds to the peer review charge question. The second number is the sequential order in which the comment was recorded.

Column 2: Panelist number. A number identifying the panelist from the list of panelists (Section 1.2).

Column 3: Summary of comment. This column presents a summary of the comment extracted from peer review response. When commenters are grouped, the comment represents the comment was common to each commenter in the group.

Column 4: Response to comment

Column 5: Revision. This column states whether the methodology and/or whitepaper were revised based on the comment.

Category 3B/Overwhelming Evidence

COMMENT	WG Member	COMMENT SUMMARY	RESPONSE	REVISION
1.1	7	Page 6 of the white paper states the following: “Rather than creating an incentive to remain in Category 3B indefinitely, DEQ could require that the water body be placed in Category 5 after a given number of Integrated Report cycles if no new data were collected.” We do not believe that this is good policy. It is up to DEQ to prioritize and conduct monitoring of streams that are of concern. Elevating a listing to category 5 because of inaction is not appropriate. This statement should be deleted.	DEQ does not intend to place water bodies in this scenario in Category 5 if no new data are collected. DEQ intends to use Category 3B to prioritize monitoring for potential areas of concern.	DEQ clarified in the white paper that this is not DEQ’s intention.
1.2	7	Recommends that overwhelming evidence criteria be based on the exceedance of the acute criteria along with other supporting lines of evidence rather than twice the chronic criteria as noted in the white paper. We believe that an acute criteria exceedance along with other supporting lines of information is a better indicator of overwhelming evidence than use of the chronic criteria.	DEQ agrees that the magnitude of exceedance component of the overwhelming evidence concept will be based on two times the acute criteria, not the chronic criteria, as previously stated.	DEQ will revise the white paper and methodology to reflect this change.
1.3	7	DEQ proposes to list an assessment unit with no data if the assessment unit is between two assessment units that have a category 5 listing for the same pollutant. We believe that listing decisions should be based on available data for the assessment units; assessment units are separated based on physical and hydrologic factors; as such, data from one assessment unit should not be applied to another. Broader scale evaluations that consider the entire watershed are necessary in determining the scope of the problem; this can be done as part of a TMDL or other evaluation where conditions in the entire waterbody are examined. DEQ should not list assessment units where there is no data to support a listing.	DEQ may propose to list an assessment unit that is in between two assessment units that are identified as impaired; however, this will be done on a parameter specific, case-by-case basis. Where this scenario may be most applicable is during the 2012 crosswalk when existing Category 5 listings must be accounted for.	None currently

Data Aggregation

COMMENT	WG Member	COMMENT SUMMARY	RESPONSE	REVISION
2.1	7	The white paper was updated to allow for the use of average values where there are multiple sources of data available for the same assessment unit and same time period.	The white paper was updated to allow for the use of median values where there are multiple sources of data available for the same assessment unit and same time period.	Update is reflected in white paper.

Listing/Delisting

COMMENT	PANELIST	COMMENT SUMMARY	RESPONSE	REVISION
3.1	7	Supports the use of the binomial test with the exceedance rate and confidence interval as noted in the white papers.	No response required.	None required.
3.2	7	Recommends that DEQ include a specific statement in these documents that enables the use of coincidental data (e.g. metals data along with sample specific hardness values) when they are available rather than default values in making listing and delisting decisions.	DEQ agrees that coincidental data (e.g. metals data along with sample specific hardness values) is preferred over default values for making listing and delisting decisions.	DEQ will add an additional statement clarifying the use of coincidental data over default data.
3.3	9	Will provide additional comment during public review process	No response required	None required

COMMENT	PANELIST	COMMENT SUMMARY	RESPONSE	REVISION
3.4	9	Has concerns about the application of the reverse null hypothesis.	<p>Comment references Dr. McLaughlin’s peer-review comment regarding clarification of minimum data requirements and certainty where DEQ would consider waterbodies for delisting. This comment noted that waterbodies on the current 303(d) list were evaluated under previous methods known to have a high probability of false-positives for impairment. Dr. McLaughlin’s comment also noted that the adoption of more stringent delisting procedures has potential to leave any erroneous listings in category 5. DEQ believes that the selection of a data window spanning the last 10 years for the next integrated report will address these concerns; as it results in a de-facto re-evaluation of any potential false-positive listings added to the 303(d) list during the two most recent integrated reports. DEQ will not have the ability to review listings in this report older than 10 years for which a TMDL has not been completed or for which new data has not been submitted.</p>	Minor changes to the white paper

HABs

COMMENT	PANELIST	COMMENT SUMMARY	RESPONSE	REVISION
4.1	9	Concern there is no federally approved test method for cyanotoxins and no local availability for testing.	There are methods for cyanotoxin testing, but the analytical techniques continue to advance. DEQ is in the process of developing the capability to perform cyanotoxin testing.	No revision
4.2	9	Concern that DEQ has not considered the regulatory implications of the new methodology especially in regards to the 1200-Z stormwater permit.	DEQ is not requiring permittees to perform cyanotoxin testing. Current Category 5 listings for HABs have no monitoring requirement under the 1200-Z stormwater permit. Exemptions for monitoring are contained on Page 5, Paragraph 1.c.i. "Biological communities and no pollutant, including indicator or surrogate pollutants, is specified as causing the impairment..."	No revision
4.3	9	Proposed methodology is overly conservative. Listing requires two seasons, but does not specify consecutive seasons. The delisting method requires three consecutive seasons free of OHA advisories.	Data to include a waterbody as Category 5 for HABs specifies two seasons, as opposed to two consecutive seasons since a statewide monitoring strategy for HABS does not currently exist. Even though there may not have been an advisory in a given year, it does not mean that one did not occur. Requirements for delisting include an annual monitoring plan.	No revision
4.4	9	Suggestion that the 2018 listing methodology place waters of concern in Category 3B, not in Category 5. The HABs methodology should be re-evaluated when further evidence is available for the 2020 List. Category 3B should be used until there is a known and readily available test method for stormwater permit monitoring and there is a better understanding of how the total maximum daily load process would address Category 5 HAB listings.	DEQ does not have the option to only place waterbodies in Category 3B for HABs. EPA has demonstrated through its re-evaluation of the 2012 303(d) list that waterbodies will be placed in Category 5 when OHA recreational advisories have occurred.	No revision

Arsenic

COMMENT	PANELIST	COMMENT SUMMARY	RESPONSE	REVISION
5.1	9	Any sampling approach and statistical analysis needs to be statistically significant, demonstrate data relationships and examine and address Type I and Type II error rates.	The paired arsenic sampling that was done was collected as part of DEQ's ambient and toxics monitoring programs. It was not designed with this question in mind.	No Revision
5.2	9	We believe the inclusion of the non-detect data is a plus for examining the effect of non-detects on Type I and Type II errors.	The inclusion of non-detect data does little to inform the relationship between total recoverable and inorganic arsenic. Since quantitation limits are less than the numeric criteria of 2.1 µg/L, inclusion of non-detects in the translator calculation would bias the results.	No Revision
5.3	9	Suggest strengthening the analysis with a discussion of the regression equation residuals and expansion of the policy implications of Root Mean Square Error Figures 1a and 1b.	DEQ will supplement the discussion of the regression equation residuals. Policy implications of the various translators are confounded by the transition to a geometric mean to assess human health uses.	Minor revisions to white paper
5.4	9	It is not clear whether the data show a stronger relationship because only geographical areas with known naturally occurring or anthropogenic in-stream arsenic were sampled. Providing the sampling plan to all interested parties would be helpful. We appreciate the Department providing the sampling plan to NWPPA this week.	Arsenic samples were collected as part of DEQ's ambient and toxics monitoring programs. DEQ provided the sampling locations to NWPPA and the locations will be made available to all work group participants.	No Revision

Chromium

COMMENT	PANELIST	COMMENT SUMMARY	RESPONSE	REVISION
6.1	9	Recommends inclusion of side headings and a conclusion/recommendation section for clarification.	DEQ will include headings for clarification.	Minor revision to white paper
6.2	9	The total number of chromium listings in category 5 that would be subject to re-evaluation were not provided.	DEQ did not perform an analysis of current 303(d) listings. Waterbodies will be re-evaluated with data received during the data call.	No revision
6.3	9	Endorses a full re-evaluation of all the chromium listings in the next 303(d) list.	DEQ will re-evaluate any listings where new data are provided. Absent data to make an assessment, previous category 5 listings will be brought forward to the 2018 303(d) list. DEQ encourages data submitters to submit any data they would like to see re-evaluated during this assessment.	No Revision

Alternative formats

Documents can be provided upon request in an alternate format for individuals with disabilities or in a language other than English for people with limited English skills. To request a document in another format or language, call DEQ in Portland at 503-229-5696, or toll-free in Oregon at 1-800-452-4011, ext. 5696; or email deqinfo@deq.state.or.us.