



## **NORTHWEST ENVIRONMENTAL ADVOCATES COLUMBIA RIVERKEEPER**

August 15, 2017

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*Via email only:* [triennialreview@deq.state.or.us](mailto:triennialreview@deq.state.or.us)

**Re: Scope and Priorities for Oregon Triennial Review**

Dear Ms. Williams:

Northwest Environmental Advocates (NWEA) and Columbia Riverkeeper (collectively “NWEA”) appreciate that this is the first triennial review in which Oregon DEQ has asked the public to comment on the scope of the triennial review itself, not just the results of the review.

We are, however, disheartened that so many of the items that show up on DEQ’s “Highest Priorities for Public Input” document intend to move in a direction that is not consistent with Oregon’s water quality standards but is, instead, intended to allow pollution sources to avoid meeting those standards. The stated intent of many of these items, for example those that mention variances, is to allow permits to be issued that permittees are able to comply with. But the important question is whether DEQ will use variances to reduce pollution from other than those sources or just use them to avoid obtaining pollution reductions across-the-board from the range of sources that are causing violations of water quality standards. Although previous triennial reviews have invested significant efforts into attempting to determine how to make standards more likely to result in actual water quality benefits, and to avoid unintended consequences, they certainly have not succeeded in ensuring those benefits—not through TMDLs that are not implemented, not through NPDES permits many of which are not being reissued, not through pretreatment programs, and not through nonpoint source controls outside the TMDL context. This puts DEQ at a crossroads with standards as the foundation of the

choices the agency must make. Will it take a path in which it can resume churning out paperwork that result in little to no improvement in water quality or will it take another path?

## **I. Recommendations for Oregon's Highest Priorities**

We believe that priorities for updating Oregon's water quality standards should be set on the basis of how they will best support DEQ's regulatory role. As variances are a serious endeavor and one that DEQ has not attempted before, this is likely to take up a significant portion of the agency's time. Therefore, the remaining efforts in the triennial review should be focused on establishing standards that will provide more protection for Oregon's waters, both in their stringency and with regard to the likelihood they will be used for regulatory purposes, than choosing yet additional methods of relaxing standards and providing less protection. In addition, DEQ has some basic work to do to come into compliance with the Clean Water Act and EPA's implementing regulations. Based on these objectives, we believe that DEQ's highest priorities should be the following, in addition to those items already underway:

- antidegradation implementation methods
- narrative criteria (including but not limited to toxics) implementation methods
- fish use updates, including where and when designations for trout spawning and bull trout
- John Day smoltification criterion
- sediment narrative procedures
- new 304(a) recommended criteria: acrolein, carbaryl, diazinon, and nonylphenol
- wetlands protections
- thermal refugia protection

Adoption of standards to address nutrients/nuisance algal growth/ocean acidification are also a high priority but one that we suspect DEQ is not prepared to take on in this triennial review. We urge the Department to make a decision now to address these matters in the next triennial review and proceed to take the steps that are necessary to tee that up for adoption in that cycle. There is often considerable preliminary work required prior to the development and adoption of standards and nutrient criteria are likely in that category. However, putting off that preliminary work by not adopting certain matters as priorities today has the effect of shifting those matters that require attention far off into the future. So, we urge DEQ to complete this triennial review in three years and to include in it enough advance work to address nutrients/nuisance algal growth/ocean acidification such that standards can be completed by the end of the next triennial review.

## II. Comments on DEQ's Selected Highest Priorities

### Toxics – Human Health: Methylmercury Variance(s)

We disagree with DEQ's characterization of a variance from the methylmercury criterion as having "high environmental value." We understand that this is an oblique way of saying that DEQ will issue NPDES permits instead of not issue NPDES permits, but DEQ's not issuing NPDES permits is inconsistent with the EPA's authorization of DEQ to run the NPDES program and with federal and state law. Attempting to take credit for doing something that DEQ is required to do is "truthiness"—an assertion that a particular statement is true without regard to evidence, logic, intellectual examination, or facts—but not truthful. DEQ is not required to issue only permits that it feels permittees can meet. It is essential going forward that DEQ not cloak what it is doing in terms that are intended to deceive the public. In other words, do not claim a "high environmental value" for a variance that is intended to reduce protections to uses.

This proposed variance is the epitome of the point we made at the outset of this letter. The now discredited Willamette Mercury TMDL demonstrated that the bulk of the mercury loading to the Willamette came from runoff and erosion, namely nonpoint sources. *See DEQ, Willamette Basin TMDL, Chapter 2: Willamette Basin Mercury TMDL* (Sept. 2006) at 3-25, fig. 3.4. DEQ is faced with a choice. If it uses the proposed mercury variance along with the new court-ordered TMDL to control nonpoint sources there will, in fact, be a high environmental value to the adoption of the variance. (The same would be true if it did not adopt a variance and took steps to implement the new TMDL to control nonpoint sources.) If DEQ uses both the variance and the TMDL to relieve point sources of having to meet mercury limits while doing nothing about nonpoint sources, DEQ will be guilty of wasting taxpayers' money to pretend to control pollution whilst doing nothing at all but pushing paper around. Likewise, if DEQ-issued permits allow permittees to determine their own mercury minimization plans with little regard to whether they are enforceable (including whether they are monitored) and whether they are the maximum effort possible, the entire effort to revise Oregon's human health criteria for toxics and to develop TMDLs and Willamette River-specific bioaccumulation factors will have been and will continue to be an exercise in bureaucratic inaction.

Equally to the point, DEQ should not take on the question of a methylmercury variance as part of the triennial review. If permittees are not willing to take on the initial effort of seeking a variance, DEQ should not plan on including that part of the work in this review of standards. Replacing work to keep standards updated and protective based on current science should be a higher priority than providing off-ramps for regulated sources if those sources cannot even muster the initial effort themselves. DEQ's history of capitulating to the demands of NPDES permit holders is part of the reason that Oregon has the second worst NPDES permit backlog in the nation.

Finally, without DEQ's having noted how many permittees constitute the "some" permitted facilities in the Willamette Basin that cannot meet water quality-based effluent limits based on the criterion, it is hard for the public to meaningfully comment on how high a priority this should be. The same would hold true, presumably, for DEQ's own judgment.

#### Toxics – Narrative Criterion

The "Revision Needed and Outcome" imply that DEQ currently has a procedure with which it implements its narrative criteria. We are not aware that this is true. In numerous public comments on regulatory matters in which we have invoked the narrative criteria we have never received a response that mentions such a procedure nor one that even acknowledges that Oregon has narrative criteria that are required components of water quality standards to be met. EPA, too, has expressed its view that Oregon fails to "develop and use listing methodologies for narrative water quality standards" for its 303(d) list and instructed the state to remedy this problem in its next list. Letter from Daniel D. Opalski, EPA, to Greg Aldrich, DEQ, *Re: Final Additions to Oregon's 2010 303(d) List* (Dec. 14, 2012) at 1.

This omission is long-standing and requires immediate correction. Federal regulations require that for toxic pollutants Oregon "provide information identifying the method by which the State intends to regulate point source discharges of toxic pollutants on water quality limited segments based on such narrative criteria." 40 C.F.R. § 131.11(a)(2). Oregon has never complied with this requirement.

We concur with DEQ's observation that this has a high environmental value and high administrative value and we urge its inclusion in this triennial review.

#### Fish Use Updates – Resident Trout Spawning and Bull Trout

We agree that the "where and when" of Oregon's resident trout spawning should be mapped. Indeed, they are required to be mapped to ensure their protection under the criteria that apply to them. *See Nw Env'tl. Advocates v. EPA*, 268 F. Supp. 2d 1255 (D. Or. 2003). DEQ is correct that it would be "time consuming" for DEQ to make use determinations on the fly during regulatory decision-making. In addition, a case-by-case determination does not guarantee consistency, facilitate decisions based on science, or ensure the public has had an opportunity to provide input into these standards as required.

With regard to the easy-to-update bull trout spawning and rearing for critical habitat not currently included on DEQ fish use maps, please also see comments below pertaining to both removal of designated uses and use of the antidegradation policy to efficiently address beneficial use updates.

Aquatic Life Designations – General Review and Update

We agree that updating fish use designations has value. DEQ is not, however, clear when it talks about “[u]pdat[ing] and refin[ing] interior basin resident trout designations.” Due to the fact that DEQ has a track record of attempting to avoid the requirements of the Clean Water Act, we feel compelled to point out that DEQ may not use the process of “updating” to remove designated uses without use attainability analyses and, in any event, may not remove existing uses, as defined by 40 C.F.R. § 131.3(e). DEQ cannot merely claim that uses are “out-of-date” because those uses are now extirpated or because the state’s past policy was to designate its uses broadly and proceed to remove those uses without following legal requirements.

Moreover, this need to update aquatic life designations and the previous example of needing to add 33.5 miles of bull trout spawning and rearing habitat point to a gaping hole in Oregon’s Tier I antidegradation policy. There is almost no use of Tier I in Oregon and there is no complete implementation method in place, as is required. 40 C.F.R. § 131.12(a), (a)(1). One way in which this can be partially remedied is Oregon’s adoption of a procedure similar to that used by Pennsylvania. There, the state maintains a list of waterbody segments where data indicate an existing use classification of a waterbody that is more protective than the designated use. The list is maintained on the agency’s website so that it can be viewed by the public and used by all regulatory agencies, including its own permit writers. The public may submit additions for review by the agency. Waterbodies on the list are periodically compiled into rulemaking actions when it is convenient. There is no pressure on the agency to do so frequently because it has already made provisions to ensure that existing uses that are not yet designated are readily accessible for use. See Pennsylvania Department of Environmental Protection, *Water Quality Antidegradation Implementation Guidance* (2003) at 7.<sup>1</sup> We strongly urge DEQ to adopt this approach.

The need for a procedure in Oregon such as Pennsylvania’s is that there are many sensitive uses that DEQ is currently ignoring. For example, DEQ’s focus on cold-water salmonids omits protections for cold-water amphibians (and other species) where they live in waters upstream. These so-called Type N streams are given less protection from warming under DEQ’s temperature standards. For example, the Protecting Cold Water criterion does not apply. OAR 340-041-0028(11)(c) (cold water protections do not apply to waters without threatened or endangered salmonids, waters not designated as critical habitat, and colder water is not needed for downstream temperatures). Yet amphibians are sensitive to temperature, are present in waters where salmonids are not, and require protection under the Clean Water Act as existing uses that are also broadly designated as aquatic life. We hereby incorporate by attachment a letter from Nina Bell, NWEA, to Dan Opalski, EPA, and John King, NOAA, *Oregon Coastal*

<sup>1</sup> Available at <http://www.elibrary.dep.state.pa.us/dsweb/Get/Document-47704/391-0300-002.pdf>

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*Nonpoint Pollution Control Program; Protection of the Designated Use of Amphibians in Non-Fish-Bearing (“Type N”) Streams Through the MidCoast Implementation Ready TMDL* (Oct. 5, 2012). This letter explains how some amphibians are technically protected by Oregon’s water quality standards, but afforded no real world protections due to the failure of Tier I of Oregon’s antidegradation policy and, most of all, the agency’s failure to have an adequate implementation method.

We urge DEQ to make adopting an existing use protection implementation method of the highest priority in this upcoming triennial review. The approach that we have suggested achieves timely protections, transparency, public input, and efficiency.

#### Natural Conditions Criteria: General and Temperature

Needless to say, we caution DEQ in attempting to replace the court- and EPA-vacated Natural Conditions Criteria (NCC). This does not seem to be ready for prime time, as the saying goes. Under “Revision Needed and Outcome,” DEQ states that it needs an efficient means of concluding that natural conditions should supersede duly adopted and approved criteria and yet one that is also “scientifically credible, implementable, and [that] protect[s] uses.” It suggests the possibility of a new NCC, site specific criteria, and variances. Seeking to achieve efficiency may well be at odds with an approach that is scientifically credible and that protects uses. That, after all, is what DEQ purportedly attempted to do in the past, with NCC provisions it used in sweeping gestures across entire drainage basins. It was very efficient (if you do not count the litigation) and not at all based on science or protective of uses. Note DEQ’s highest superseding NCC temperature of 32° C is *lethal to salmonids within seconds*, according to EPA’s regional temperature guidance.

We would also point out that, as participants in multiple triennial reviews of Oregon’s temperature standards, that DEQ and its advisory committees have wrestled with how to make temperature standards come to bear on the greatest contributors of thermal loading—nonpoint sources of pollution—while not having unintended effects on point sources. Those committees have wrestled with the issue but never been successful, primarily because DEQ has never had the political will to regulate nonpoint sources. This is similar to the mercury problem in that DEQ may expend significant resources on a pollutant—developing criteria, analyzing 303(d) listings, and preparing TMDLs—without ever being willing to tackle the overwhelmingly primary source of that pollutant. This renders the agency ineffectual. If there is no intent to achieve any water quality benefit, we suggest that the triennial review should not include this parameter. Moreover, as stated above, it does not appear that DEQ is ready to take this project on.

#### Temperature: Variance

It is unclear why a temperature variance is a separate concept when it is included as part of the description of potential solutions to the lack of an NCC for temperature and the description of the

variance approach invokes the problem of natural conditions. Is this also a suggestion for a variance that seeks to avoid compliance with numeric criteria even where natural conditions are not the rationale? If so, we object to DEQ's attempt to avoid achieving one of the primary pollutants afflicting state waters and one that is at the heart of the state's purported effort to 'save salmon.'

We urge DEQ to stop engaging in "doublespeak"—language that deliberately obscures, disguises, distorts, or reverses the meaning of words—such as calling temperature variances of "high environmental value in protecting aquatic uses and improving temperature-related water quality." How is voiding a numeric criterion that DEQ repeatedly calls "biologically-based"—as if numeric criteria were not required by law to be biologically-based—a form of protection of uses and an improvement in water quality? DEQ should remove the temperature variance from the "highest priorities" list.

#### Dissolved Oxygen Clarifications

No comment.

#### Cold Water Refuge Plan for Lower Willamette River

DEQ has been talking about thermal refugia since the 1992-1994 triennial review. That's a long time for an agency that still does not know what its own narrative refugia criterion means. We are pleased to see that there is progress, even if it took NWEA's litigation to get to this point. We suggest, however, that DEQ will have to revisit its unsupported notion that protection and restoration of refugia can be accomplished through NPDES permits. It is pointless for DEQ to create complicated water quality standards, such as the refugia provision, if it has not given practical thought as to how these standards will be implemented. This is not in the interest of DEQ, the environment, or the public.

### **III. Comments on DEQ's Second Tier Priorities**

#### Biocriteria

We support DEQ's broadening the usefulness of the biocriteria but given that DEQ struggles to use the existing biocriteria in its regulatory program, we question whether this is the best use of DEQ's time. Priorities should be set on the basis of how they will best support DEQ's regulatory role. For now, unless DEQ resolves to use biocriteria in its regulatory program more extensively than it does now, we think that this should be a low priority.

### Drinking Water

This should not necessarily be considered separate from the high priority item “Toxics – Narrative Criterion.” As discussed above, federal regulations *require* an implementation method for toxics under certain circumstances—methods that DEQ acknowledges that it lacks. However, the regulations *do not limit* DEQ to those circumstances when it develops implementation methods for its narrative criteria and designated use protection. The problem that DEQ has suffered from for a very long time is that it knows the legal definition of water quality standards, but it has no methods by which to implement anything other than the numeric criteria. For example, even the Natural Conditions Criteria, which it put to monumental use in its temperature TMDLs, was used inconsistently. For example, one TMDL would assume that tributary inputs for the modeling of so-called natural conditions were *current* temperatures, while another would assume those tributaries were at numeric criteria, and yet others were a complete mystery as least insofar as what appeared in writing to the public. *Compare* DEQ, *Applegate Subbasin Total Maximum Daily Load (TMDL) HUC #17100309* (Dec. 2003) at 49 (“Applegate and Little Applegate modeling used current tributary temperatures as inputs into the future condition scenario.”) *with* DEQ, *Middle Columbia-Hood (Miles Creeks) Subbasin TMDL* (Dec. 2008) at 55 (“Tributary temperatures were set to their estimated Natural Thermal Potential conditions.”). Likewise, the results were inconsistent, with some TMDLs providing replacement criteria and others resulting in the apparent basin-wide elimination of applicable numeric criteria altogether.

In the absence of CWA section 304(a) EPA-recommended criteria, DEQ is not in a good position to develop its own numeric criteria for current use pesticides in drinking water. But it can use the available science to devise methods to implement its narrative criteria, adjusting those in the future as more information becomes available. We do support DEQ’s involvement in an effort to keep drinking water sources clean rather than allowing pollution sources to shift the burden of treating drinking water to users, or in some cases shift the risk to people drinking untreated and polluted water. However, we see no reason that in the context of establishing methods of using its existing water quality standards—designated uses, narrative criteria, and antidegradation policies—DEQ cannot achieve this important goal. In doing so, it will likely provide benefits to aquatic species as well.

### Designated Use – Aquatic Life – Trout

No comment.

### Toxics – site specific solutions

This, as DEQ notes, is not a priority. DEQ’s description lacks any reference to permittees’ access to compliance schedules to address difficulties in meeting toxic standards.



We suggest that DEQ establish some method by which it can communicate to the public information about the discussions that it is having with one or more permittees about their desire for one or more variances and/or site-specific criteria. DEQ's *Water Quality Standards Review Second Tier Priorities* chart alludes to these discussions being ongoing. Because such discussions concern increasing the allowable levels of pollutants where those levels have been chosen based on their safety for people and their protectiveness for aquatic life, DEQ should disclose those discussions. For example, DEQ could create a page on its website where it notes what is under discussion, thereby allowing for the broadest possible input if such proposals move forward. Creating transparency is a high priority.

#### Temperature [smoltification protection in the John Day]

DEQ says that this proposal is only medium priority because it was required in a biological opinion but otherwise is unimportant because the John Day is already identified as impaired by temperature and there is a TMDL in place. This rationale does not hold water. First, knowing when, where, and why standards are being violated is an important first step to knowing how to restore waters to those standards. Seasonality and location of violations are key, for example, to knowing where thermal refugia are needed and whether they will provide protection. They are also a part of the legally required aspects of a TMDL. Moreover, as DEQ should know, the John Day Basin TMDL is subject to the outcome of the litigation in *Northwest Environmental Advocates v. EPA*, Case 3:12-cv-01751-AC, in which a decision was rendered for plaintiffs on April 11, 2017. Therefore, writing public statements that imply that the water quality standards that underlie that TMDL are irrelevant and that the TMDL has been completed is wholly misleading. In all likelihood one or both of those will be changing and smoltification will have to be addressed. Therefore, DEQ should include smoltification protection in the John Day in this triennial review.

#### Algae – Harmful algal blooms

DEQ's comments on harmful algal blooms are less than clear. On its face, both charts produced by DEQ appear to address the triennial review as including matters that may require rulemaking and that may require guidance, procedures, or implementation methods. Yet on this topic, which concerns procedures, DEQ's reasoning for its lower priority is "DEQ can address the issue with current rules." The fact that DEQ "can" address the issue of harmful algal blooms with current rules says absolutely nothing about whether DEQ *will* address them with current rules and whether DEQ has given *sufficient thought as to how to address them* that would be entailed in preparing procedures. And it doesn't say why developing procedures should not be a part of the triennial review. As DEQ notes, these algal blooms are "increasing." Either DEQ figures out a way of getting out in front of the future increases or it continues to let existing and designated uses become impaired. When DEQ states that the lack of a procedure is "not impeding regulatory actions at this time," it conveys a very limited notion of what its regulatory role is in

protecting Oregon's water quality. It would require DEQ's taking actions for lack of a procedure to impede the actions and DEQ has not taken the first step.

#### Algae – nuisance algal growth

DEQ states that it has not consistently implemented the narrative criterion and the chlorophyll-a action level because it has no procedures document to prevent nutrients from causing dissolved oxygen and pH exceedances. In particular it highlights the fact that it has no procedures that address issues prior to the establishment of a TMDL in which dissolved oxygen and pH are translated to nutrient loadings and assigned to sources. However, it only assigns a "medium" priority to this problem. A quick look at a recent draft TMDL demonstrates that while DEQ can manage to conduct this analysis in a TMDL, it is clear that first the water must become polluted to unsafe levels. See DEQ, *draft Upper Klamath and Lost River Subbasins TMDL, Chapter 2: Klamath River Dissolved Oxygen, Chlorophyll a, pH, and Ammonia Toxicity* (March 2017). This is not the point of water quality standards. Standards should be used to prevent the impairment of designated and existing uses and thereby preclude the need to develop and implement a TMDL. Not only is this consistent with the Clean Water Act, but it is cost effective. Alternatively, to wait until impairment is manifested to act is often to preclude a waterbody's attainment of standards for a very long time.

We disagree with DEQ's view that the absence of knowing how to protect Oregon's waters from nuisance algae caused by excess nutrients is "not impeding regulatory actions at this time." This conclusion is based solely on DEQ's notion of what is a needed regulatory action, namely the issuance of permits. For example, the Upper Klamath and Lost River Subbasins TMDL includes analyses that pertain to some of the most lengthy administrative extensions in DEQ's massive permit backlog. This alone suggests that DEQ is incorrect in concluding that lack of provisions for algal growth are not impeding regulatory actions. In addition, DEQ is incorrect that only NPDES permits are regulatory actions that it can and should take to control pollution, including nutrients that contribute to excess algal growth.

#### Antidegradation

The description of the need to address Oregon's antidegradation policy implementation methods is inadequate and misleading. While there is a reference to EPA's new 2015 regulations, there is no reference to the court-ordered EPA review of Oregon's antidegradation policy and implementation methods entitled *The EPA's Review of Portions of Oregon's March 2001 Antidegradation Policy Implementation Internal Management Directive for NPDES Permits and Section 401 Water Quality Certifications* (August 8, 2013) (hereinafter "EPA Review"). DEQ states that because of this review, "there would not likely be significant changes." That implies that the review was positive, which is incorrect, as explained below. In fact, the combination of the new EPA rules and the critical EPA review both indicate that revising the antidegradation

policy implementation methods is actually a high priority. We disagree that this is just a matter of DEQ's writing the procedures "more clearly" as asserted in this document.

After the EPA Review in 2013, DEQ issued a "narrow modification" to its guidance. *See* Memorandum from Jennifer Wigal, DEQ, to DEQ Water Quality Permit Writers and 401 Staff, Re: *Procedures for existing use review during antidegradation analysis* (Nov. 3, 2014). This modification is not a sufficient response to the EPA findings. First, it only addresses existing use protection in the context of NPDES permits and 401 certifications. Water quality standards, including Tier 1 of the antidegradation policy, apply to all waters, not just certain sources. Therefore, the limitations of the memorandum render it an inadequate response both to the EPA review and to the new EPA rules. The new 40 C.F.R. § 131.12(b) requires that the state have methods for implementing the antidegradation policy that are consistent with the policy and with 40 C.F.R. § 131.12(a). A federal court has held that the description of existing use protection in the "purpose" statement of the antidegradation policy at OAR 340-041-0004(1) provides the protection required by the federal rules. *Nw. Env'tl. Advocates v. U.S. Env'tl. Prot. Agency*, 855 F.Supp.2d 1199 (D. Or. 2012). This rule provides for ensuring "the full protection of all existing beneficial uses," consistent with federal requirements. Therefore, DEQ is required to have implementation methods that apply to all waters, not just apply to point sources as the modification memorandum does. This is important to ensure that, for example, TMDLs developed for watersheds address existing use protection, and logging practices and other activities that occur in locations where DEQ is not focused on salmonid protection are granted protection as well. Likewise, protection of lakes and wetlands can be based on existing use protection. For example, although DEQ claims that it does not allow discharges to lakes, it does in fact allow discharges of herbicides into lakes under NPDES permits for the purpose of killing lake vegetation. This, in turn, has the potential to suck the oxygen out of the lake waters, imperiling such species as reptiles and amphibians. DEQ should consider these types of scenarios in preparing antidegradation implementation policies.

EPA's summary of its findings of inconsistency with the then-existing federal rules is as follows:

- Existing use protection, with regard to applicability and method for implementation (see sections II.A and III).
- The use of measurable and statistical significance when determining whether an activity would lower water quality in the implementation of Tier 2 and Tier 3 (see section II.B.2.a).
- Implementation of the requirement at 40 CFR 131.12(a)(2) that when allowing a lowering of water quality "...the State shall assure that there shall be achieved the highest statutory and regulatory requirements for all new and existing point sources and cost-effective and reasonable best management practices for nonpoint source control." (see section IV.D).
- How antidegradation is addressed for general permits (see section VI).

In addition:

- To ensure consistency with 40 CFR Part 131, ODEQ should clarify its approach to addressing parameters in Water Quality Limited Waters, where water quality is not better than necessary to meet the applicable criteria, when a lowering of water quality is proposed (see section VII).
- Clarification of how ODEQ interprets its definition of “Waters of the state” is necessary before the EPA can determine if the scope of ODEQ’s IMD with regard the waters covered is consistent with the CWA and 40 CFR 131.12 (see section I).

EPA Review at 3–4. For details, see the document. To dismiss the need to respond to five out of six federal findings of inconsistency because the review itself was “recent” makes no sense given that DEQ did not respond at the time and correct the problems. Moreover, the new federal rules on antidegradation emphasize the importance of public participation. *See* 40 C.F.R. § 131.12(a)(2)(i), (b). In addition, EPA has instructed DEQ to use its antidegradation policy in developing its next 303(d) list, a near impossibility if DEQ fails to establish clear methods. *See* Letter from Daniel D. Opalski, EPA, to Greg Aldrich, DEQ, *Re: Final Additions to Oregon’s 2010 303(d) List* (Dec. 14, 2012) at 1.

These new rules create new requirements that DEQ needs to meet. Since for purposes of Tier II, DEQ staff changed the state’s historic parameter-by-parameter approach to a waterbody-by-waterbody approach in 2000, the state now must meet the requirements of the revised federal regulation that pertain to states that use the latter approach:

Where the State identifies waters for antidegradation protection on a water body-by-water body basis, the State shall provide an opportunity for public involvement in any decisions about whether the protections described in paragraph (a)(2) of this section will be afforded to a water body, and the factors considered when making those decisions. Further, the State shall not exclude a water body from the protections described in paragraph (a)(2) of this section solely because water quality does not exceed levels necessary to support all of the uses specified in section 101(a)(2) of the Act.

40 C.F.R. § 131.12(a)(2)(i). In addition, DEQ’s guidance on antidegradation is so muddled as to have caused EPA to misconstrue what DEQ has done to its Tier II protections. Nonetheless, DEQ’s adoption of what it calls the “categorical approach” triggers a need to respond to new federal requirements in two ways, first to identify the factors to be considered when DEQ is going to provide Tier II protections to waterbodies and, second, to ensure that waters are not

excluded from Tier II protections solely because they are not meeting the core uses of the Act. And it must do so by including the public.

### Sediment

We agree that DEQ's lack of implementation methods limits implementation of narrative criteria that apply to sediment. We fail to understand how DEQ arrives at the conclusion that there are "no external drivers or pending actions creating urgency for this project." First, the fact that Oregon is home to species—as DEQ mentions, they are "threatened and endangered salmon and steelhead and other native biota"—that are on the verge of extinction from water pollution including excess sediment and sedimentation should be considered an "external driver" that creates "urgency."

Second, the reason that DEQ does not see any external drivers is because it is not doing its job to control nonpoint source pollution. One clear indication of its failure in this regard is the joint EPA/National Oceanic and Atmospheric Administration determination in early 2015 that Oregon has failed to adopt forest practices that meet water quality standards. *See* EPA, NOAA *NOAA/EPA Finding That Oregon Has Not Submitted a Fully Approval Coastal Nonpoint Program* (Jan. 30, 2015) ("NOAA and EPA arrive at this decision because they find that the State has not adopted additional management measures applicable to forestry that are necessary to achieve and maintain applicable water quality standards under Clean Water Act section 303 and to protect designated uses. NOAA and EPA first identified and notified the State of the need to implement the additional measures in 1998."). EPA/NOAA did not make a finding on whether Oregon's agricultural measures are adequate, *id.* at 3, but it did cite a range of concerns about the adequacy of those measures, *id.* at 22. In addition, NWEA submitted a declaration from an expert on the efficacy of the nonpoint source management measures for agriculture used by Oregon that concluded they are not adequate to meet water quality standards. *See Declaration of Jonathan J. Rhodes in Support of the U.S. Environmental Protection Agency's and the National Oceanic and Atmospheric Administration's Proposal to Disapprove the State of Oregon's Coastal Nonpoint Pollution Control Program* (March 14, 2014).

Third, DEQ standards staff apparently are not aware of the efforts of DEQ TMDL staff in developing MidCoast TMDLs to address sediment, efforts that are focused on the very question of how to apply the sediment criteria in regulatory processes. *See, e.g.,* DEQ, *Sediment Technical Working Group LSAC Update* available at <http://www.oregon.gov/deq/FilterDocs/071515lsacSedtwg.pdf> (July 15, 2015); DEQ, *Mid-Coast Sediment TMDL, Sediment Technical Working Group* (Jan. 14, 2015) available at <http://www.oregon.gov/deq/FilterDocs/011415pres.pdf>.

Last, EPA has told DEQ that it expects Oregon to "use a sediment listing methodology" for its next 303(d) list of impaired waters. Letter from Daniel D. Opalski, EPA, to Greg Aldrich, DEQ, *Re: Final Additions to Oregon's 2010 303(d) List* (Dec. 14, 2012) at 1. True, if DEQ has no

intention of getting serious about controlling nonpoint sources, there may be little real value in its moving forward with clarifying how it intends to use its existing standards. But assuming that the agency might possibly be interested in controlling excess fine sediment, this should be a high priority.

### Three Basin Rule

As an initial matter, DEQ provides an abbreviated description of the problem for the Three Basin Rule. This undermines the public's ability to comment on the Rule's priority for the instant Triennial Review.

First, we urge DEQ to not attempt to amend rules by issuing memoranda. That will lead to less consistency and general understanding of the rules. Second, the rule language was very carefully crafted by DEQ with the help of an advisory committee. Every attempt was made to limit increased pollution in these subbasins without creating unintended consequences that could actually lead to increased pollution. Maybe mistakes were made. However, there were underlying agreements that were crafted and DEQ has not stated whether it has returned to the administrative record of that rulemaking, including particularly the advisory committee input, to see if the answers lie there. Third, it is unclear what DEQ finds unclear. The provision states that "new or increased waste discharges must be prohibited, except as provided by this rule[.]" OAR 340-041-0350(1) (emphasis added). That is, the exception is built in. The rule then goes on to explain the exceptions. Why is this unclear? DEQ needs to provide more information to the public to elicit thoughtful responses on whether this is a priority.

### Variance Procedures

We agree that ensuring the Oregon variance procedures comply with new federal regulations is a good idea. We have done this analysis and are certain that they do not comply. Therefore, we are unclear why the description only pertains to "DEQ procedures" and does not state that the Oregon rule itself needs revising. If, as we suspect and DEQ suggests, it intends to rely heavily on variances, it should get its house in order because if it relies solely on Oregon rules, the proposed variances will not be approvable by EPA. Our evaluation demonstrates that Oregon's rules are missing requirements or otherwise inconsistent with federal rules in many ways, including but not limited to the following: duration, reevaluation, stringency, expression, nonpoint sources, attainability, enforceability, public participation, and renewals.

At least equally important is that DEQ consider where it stands with uncontrolled pollution sources. This is a time when DEQ is proposing to use variances for all manner of pollutants, wherever it appears that the interests of vested point source interests will be harmed in any way by water quality standards, from toxic to conventional pollutants. This is a very expansive view of this authority. Since its use, by and large, will be driven by DEQ's desire to relieve NPDES permittees of pollution control obligations, the agency and the Commission should strongly

consider whether leaving nonpoint sources off the hook for pollution controls at the same time is a smart public policy. DEQ's current variance rules certainly do so and EPA's rules, while requiring more than Oregon's, are not strong enough to ensure that progress in reducing pollution is made. DEQ is at a crossroads, needing to decide whether to continue pretending that it controls nonpoint sources while doing nothing or actually stepping up to the plate to do so. If it is the first, the entire process of variances will go on in perpetuity, with DEQ continuing to claim year after year, decade after decade, that point sources cannot afford to clean up and nonpoint sources remaining entirely off-the-hook. If it is the latter, now is the time to address the issue to make sure that Oregon's variance rule supports the policy initiative to control nonpoint sources and make real progress in attaining water quality standards during a variance.

### Wetlands

The benefits of wetland protection in Oregon are well-documented and acknowledged by multiple state agencies and the Oregon Legislature. Yet DEQ acknowledges that the agency lacks adequate tools to protect wetlands. See Oregon Department of Fish and Wildlife, *Oregon Conservation Strategy* (2016). Wetlands are under increased threat by developers as Oregon's population increases and the economic recovery moves forward. A recent report by the Oregon Department of State Lands ("DSL") documents the pressing need for DEQ to ensure the agency is well-positioned to protect wetlands. Oregon Department of State Lands, *Aquatic Resource Management Program Report, Fiscal Years 2015 and 2016* (2016). Despite empirical data demonstrating the threat to wetlands, and countless studies and reports on the benefits of wetland protection, DEQ proposes no updates to agency guidance or standards yet it has no wetland-specific criteria or guidance.

DEQ has been unable to establish water quality standards for wetlands in past efforts. If DEQ wants to increase its ability to protect wetlands, as it should, we suggest that it not focus on rulemaking for narrative and/or numeric criteria but rather that it focus on how to use Tier I of the antidegradation policy to protect existing uses and how to make the designated use of aquatic life more useful, including through such implementation policies, to protecting wetland species. We have demonstrated to DEQ how it can address species other than salmon. For example, Letter from Nina Bell, NWEA, to Dick Pedersen and Greg Geist, DEQ, Re: *Petition for Reconsideration of May 15, 2012 Letter Approving Coverage Under the NPDES General Permit 2300A for the Fairview Lake Property Owners Association* (June 20, 2012); Letter from Nina Bell, NWEA, Dan Opalski, EPA and John King, NOAA Re: *Oregon Coastal Nonpoint Pollution Control Program; Protection of the Designated Use of Amphibians in Non-Fish-Bearing ("Type N") Streams Through the MidCoast Implementation Ready TMDL* (Oct. 5, 2012). Such an approach might actually make it through the triennial review process as clearly required by and consistent with the antidegradation policy and required implementation methods. Protecting wetlands is a priority.

### Outstanding Resource Waters

Outstanding Resource Waters represents a failed effort by DEQ in the past. One reason that it failed is that some participants in DEQ's advisory committee, including NWEA, took the position that there was no point in creating a process for this designation if there were little or no protection awaiting any waters that were subsequently designated as ONRW. We still believe that if there is no water quality protection purpose, there is no reason for DEQ to create an elaborate procedure that tricks the public into thinking that Tier III status means anything.

First DEQ needs to identify whether there are any "automatic" protections triggered by the Tier III status that would apply absent any specific DEQ protection actions. For example, most areas that are subject to ONRW designation are not likely to be subject to new NPDES permits, permits that would not be allowed to issue under the designation. If no such automatic protections would be triggered, then DEQ should identify what kinds of actions it could take that could provide actual, real world water quality protections, reveal such a list to the public, and engage in further discussion about whether they are sufficient to warrant the effort of putting Tier III procedures into place. If the majority of increased pollution would come from sources that DEQ has failed to control to date, namely nonpoint sources, then DEQ should admit to the public that in Oregon this designation would simply be misleading because it would provide zero protection for waters with it.

In addition, if DEQ continues to use its staff-promulgated antidegradation policy that no water is eligible for ONRW designation if any single parameter is less than high quality, these Tier III policies would apply to so few waters that it is really a waste of time to engage in the discussion. Of far greater merit would be to ask for public input into that underlying policy— that treats waters as *protected from degradation on a parameter-by-parameter basis* when they are listed as impaired for a pollutant or parameter but *precludes protection from degradation on a waterbody-by-waterbody basis*. NWEA believes that this is inconsistent and poor policy that is intended to provide pollution sources with the maximum opportunity to pollute and to provide the public with the minimum opportunity to provide public waters with legal protections from pollution. Changing this would be the first logical step in a series of steps intended to designate and protect special waters in Oregon under Tier III.

### Toxics – aquatic life criteria

We suggest that DEQ allow EPA to adopt the aluminum criteria because it has a significant backlog of water quality standards work to address. However, as the new 304(a) criteria will present implementation issues, we urge DEQ to attend to that issue within this triennial review or to plan to do so in the next triennial review if that is more appropriate considering the timing.

We also strongly urge DEQ to adopt criteria for acrolein, carbaryl, diazinon, and nonylphenol during its next rulemaking. First, the Clean Water Act requires the state to adopt new criteria for



which EPA has published any new 304(a) recommended criteria, the discharge or presence of which in the affected waters could reasonably be expected to interfere with the designated uses. CWA § 303(c)(2)(B). EPA has adopted new rules that require states' triennial reviews to provide explanations of its submissions if it decides not to follow the Act. 40 C.F.R. § 131.20(a). Therefore, merely calling these criteria "not ... urgent" is not a sufficient explanation for DEQ's proposal to possibly not proceed with these criteria. Moreover, it is difficult to understand how DEQ can have a permit that is primarily for the discharge of acrolein and copper herbicides into irrigation systems and conclude that having an updated acrolein criterion is not urgent.

Likewise, it is difficult to understand how DEQ could term "not urgent" the need to adopt criteria for pesticides that the National Marine Fisheries Service (NMFS) has already determined cause jeopardy under the Endangered Species Act as EPA has approved them under FIFRA, namely diazinon and carbaryl. *See, e.g., NMFS, National Marine Fisheries Service Endangered Species Act Section 7 Consultation Biological Opinion Environmental Protection Agency Registration of Pesticides Containing Chlorpyrifos, Diazinon, and Malathion* (November 18, 2008) available at [http://www.nmfs.noaa.gov/pr/pdfs/pesticide\\_biop.pdf](http://www.nmfs.noaa.gov/pr/pdfs/pesticide_biop.pdf); *NMFS, National Marine Fisheries Service Endangered Species Act Section 7 Consultation Biological Opinion Environmental Protection Agency Registration of Pesticides Containing Carbaryl, Carbofuran, and Methomyl* (April 20, 2009) available at <http://www.nmfs.noaa.gov/pr/pdfs/carbamate.pdf>; *see also NWEA, Before the Oregon Environmental Quality Commission, Petition to Initiate Rulemaking and Take Other Actions to Protect Existing and Designated Uses of Fish and Wildlife From Point and Nonpoint Sources of Pesticides* (Aug. 9, 2012) (describes jeopardy opinions and Reasonable and Prudent Alternatives). Since EPA does not conduct national consultations and does not consult on the publication of 304(a) recommended criteria, Oregon's adoption of numeric criteria in water quality standards is an appropriate regulatory program in which to assure that threatened and endangered aquatic species are protected from these pollutants.

As for nonylphenol, as EPA has described in other regulatory actions concerning this pollutant,

[Nonylphenol] NP and [Nonylphenol Ethoxylates] NPEs are produced in large volumes, with *uses that lead to widespread release to the aquatic environment.*

*NP is persistent in the aquatic environment, moderately bioaccumulative, and extremely toxic to aquatic organisms.* NP has also been shown to exhibit estrogenic properties in in vitro and in vivo assays. NP's main use is in the manufacture of NPEs.

*NP and NPEs have been found in environmental samples taken from freshwater, saltwater, groundwater, sediment, soil and aquatic biota.* NP has also been detected in human breast milk, blood, and urine and is associated with reproductive and developmental effects in rodents.

EPA, *Risk Management for Nonylphenol and Nonylphenol Ethoxylates*, available at <https://www.epa.gov/assessing-and-managing-chemicals-under-tsca/risk-management-nonylphenol-and-nonylphenol-ethoxylates> (emphasis added). It has now been over a decade since EPA issued the 304(a) recommended criteria for nonylphenol. The criteria document states that “[a] reconnaissance of 95 organic wastewater contaminants in 139 U.S. streams conducted in 1999-2000 revealed that nonylphenol was one of the most commonly occurring contaminants and was measured at higher concentrations than most of the other contaminants.” EPA, *Aquatic Life Ambient Water Quality Criteria – Nonylphenol 3* (Dec. 2005) (citations omitted). It seems evident that these criteria are of high priority.

#### Use Attainability and Site Specific Criteria

We agree that there is little value to revisiting this because its use is “rare.” We fail to understand why DEQ has given this a medium priority. It appears to us that there is a preponderance of methods to avoid applying or meeting water quality standards that are considered “high priority,” so adding even less important ones in lieu of actually improving the protectiveness of Oregon’s standards is not prudent.

#### Water Quality Limited Waters Rule

DEQ has clarified that its intention in this section is to refer that portion of OAR 340-041-0046 that describes the assessment and listing process for Water Quality Limited waters. While we agree that the 303(d) listing process is not water quality standards, we do want to remind DEQ that changes to the listing process can very clearly have the effect of changing water quality standards. As this rule primarily cross references other rules, it does not appear to add confusion to permit writers; it does not appear to be a high priority and we recommend against making it one.

#### Designated Uses – public water supply, other

We agree with DEQ’s rationale for making these low priorities. Moreover, DEQ should focus more of its resources on protecting waters, not relieving them of protection. The reality is that DEQ does very little if anything to protect drinking water sources such that the designated use of public drinking water supply comes to bear on regulatory activities. Therefore, it makes the accuracy of this use designation of even less importance.

#### pH

Given that DEQ has not identified any urgent need to proceed with yet another effort to provide less protective water quality criteria, in this case based on natural conditions, we urge that it

forgo this matter and puts its efforts into at least some standards development that will provide greater protection to existing and designated uses.

### Turbidity

We believe that turbidity is a priority because of its effects on drinking water and aquatic life but we lack confidence that DEQ will be able to bring this past the finish line if it makes a new attempt. The materials provided by DEQ do very little to explain precisely what happened in the past and why, despite a considerable investment of resources into this parameter, it was not completed. Therefore, we suggest that DEQ not make turbidity a priority for this triennial review but that it do encapsulate the difficulties that were encountered in a memorandum for public consumption.

### Turbidity [Implementation Procedures]

We are not aware of actions being impeded by lack of implementation procedures for DEQ's existing turbidity water quality standards, the stated basis for DEQ's having given this a low priority. However, we have seen elsewhere in this document DEQ's unfounded assertion that regulatory actions are not being impeded leading us to question the accuracy of the statement in this particular case. We urge DEQ standards staff to discuss the matter with the NPDES permitting staff to ensure that when DEQ begins issuing permits with any rapidity in the future, this does not turn out to have been a mistaken judgment.

### Waters of the State

This item is unclear. We do not understand why DEQ is suggesting here that waters of the state are related in any way to waters of the United States. This entry alludes to a need for the state definition to be consistent with the federal definition, which is a position without any basis in state law. In fact, in the last column DEQ seems to concede as much, while still clinging to the need to "ensure consistency." We reject this logic and concur that this is not only a low priority but a non-priority unless DEQ's intent is to strengthen and clarify the state definition.

Oregon agencies, including DEQ Director Whitman, recently wrote to EPA regarding the status of the Waters of the United States rule. In that letter, Oregon explained the importance of intermittent, ephemeral streams as well as floodplain wetlands and waters not hydrologically connected at the surface to the aquatic habitat of salmonids and other species, such as amphibians. *See* Letter from Richard Whitman, DEQ, et al. to Scott Pruitt, EPA (June 19, 2017). DEQ's emphasis on federal consistency seem to ignore the considerations so clearly articulated by the DEQ Director in this letter.

Pathogens [Specific Conductivity, Marine Copper, Freshwater Selenium]

It is vital that DEQ wait until EPA has completed its 304(a) recommended criteria before DEQ proceeds. There is little point to anticipating the date that EPA completes its work. There is, however, good reason to keep this triennial review to three years so that Oregon can respond to new recommended criteria in a timely fashion.

Moreover, DEQ makes no mention of EPA's draft criteria document for specific conductivity. EPA, *Draft Field-Based Methods for Developing Aquatic Life Criteria for Specific Conductivity*, available at <https://www.epa.gov/wqc/draft-field-based-methods-developing-aquatic-life-criteria-specific-conductivity>. Having just completed a comment period, this may also be ready in the near future. The same is true for freshwater selenium—a pollutant found to cause jeopardy to threatened and endangered species in Idaho by two federal agencies—and marine copper, a pollutant known to cause severe problems for salmonids. It is unclear why these aquatic life criteria in draft form at EPA have not come to the attention of DEQ.

Nutrients

We disagree with Oregon's rationale for refusing to adopt nutrient criteria. There is no evidence that the parameters that DEQ points to as being used to address nutrient pollution are working. Yet, harmful algae blooms are likely increasing globally<sup>2</sup> and are likely to get worse. For example, EPA has identified climate change as contributing to the growth and dominance of HABs. See EPA, *Nutrient Policy and Data, Causes and Prevention, How will global climate change affect cyanobacterial blooms?*, available at <https://www.epa.gov/nutrient-policy-data/causes-and-prevention#how2> (last accessed July 7, 2017) (“Anthropogenic climate change has recently been identified as a contributing factor to cyanobacterial blooms by altering many environmental conditions that may promote the growth and dominance of HABs.”).

DEQ should cease talking about the excess nutrient problem as primarily affecting “lakes,” to which it “does not permit discharges.” Many of the waters with HAB advisories issued by the Oregon Department of Health are reservoirs, which are parts of rivers as opposed to lakes. (In addition, as pointed out above, DEQ does permit discharges to lakes, at least if they are poisons.) Likewise, DEQ should not imply that it has no problems interpreting and applying its narrative criteria. In fact, DEQ has major issues with narrative criteria, including using them for

<sup>2</sup> National Oceanic and Atmospheric Administration, *Harmful Algal Blooms: Tiny Plants with a Toxic Punch*, available at <https://oceanservice.noaa.gov/hazards/hab/> (last accessed July 7, 2017) (“The human illnesses caused by HABs, though rare, can be debilitating or even fatal. HABs have been reported in every U.S. coastal state, and their occurrence may be on the rise. HABs are a national concern because they affect not only the health of people and marine ecosystems, but also the 'health' of local and regional economies.”).

identifying waters that are impaired and placed on the 303(d) list. As noted above, DEQ rarely uses narrative criteria for issuing NPDES permits and does not apply narrative criteria to control nonpoint sources at all.

The so-called “chlorophyll-a” criterion is not actually a criterion; it is an “action level” that triggers further investigation. The so-called trigger level is not a criterion to be met by any regulatory actions. Given the problems with Oregon’s regulation of nutrients and the likely increasing problems with nutrient pollution, we urge DEQ to make this a high priority. As we stated at the outset, this might be a parameter for which work should start this triennial review and be completed as rules in the subsequent review.

### Ocean acidification

Ocean acidification is related to nutrients, which can cause local acidification. While it is believed that acidification in the Pacific Ocean off the coast of Oregon is caused by coastal upwelling, shallow estuaries may be influenced by lower pH freshwater that are laden with nutrients and organic carbon. This added carbon makes the ocean more acidic when nutrient-driven algal growth decomposes and releases carbon dioxide into the water. The release of this carbon dioxide has the same effect on acidification as carbon dioxide’s being absorbed into ocean water from the atmosphere. Ocean acidification also enhances the conditions in which harmful algal blooms develop in the Pacific Ocean.

In its materials, DEQ first states that it could “revise or adopt criteria to protect aquatic life from ocean acidification.” DEQ should clarify whether the intent is to revise or adopt. There is a considerable difference in assessing the need for a criterion where there is one in place but it is not proving easy to implement or it is not entirely protective versus there is no criterion at all. This waffling suggests that DEQ does not know if it has criteria to protect aquatic life from ocean acidification, about which it then observes “may not be the best.” More problematic is DEQ’s statement that “it is unclear how Clean Water Act programs in Oregon would use the [ocean acidification] criteria in program implementation.” This implies that DEQ believes that ocean acidification is caused only by air pollution and that it cannot use the water program to address any aspects of the problem. As described above, that is simply not true. At the very least, using water programs may buy some time for designated uses in localized areas. Given the scope of the problem, this is not a low priority but, rather, it is a high one.

As we demonstrated through a declaration by Dr. Christopher Frissell submitted with our comments to EPA and NOAA on their proposed determination on Oregon’s Coastal Nonpoint Pollution Control Program, forest management affects delivery of both nitrogen and phosphorus to water. As he explained:

Phosphorus (P) is generally associated with soil disturbance and erosion from

forest management activities, including roads, which are a chronic source of erosion and sediment delivery to waters. Nitrogen (N) is broadly generated and freed into soil water, groundwater, and thus into surface water as an inevitable consequence of any kind of vegetation disturbance. Logging of large trees and fire are associated with particularly elevated mobilization of nitrogen into runoff.

\* \* \*

[I]n western Oregon, because forestry disturbs many more acres of land over a given period of years than other land uses that occur in limited, often low-lying areas, forestry is commonly identified as one of the larger, if not the largest, single source of nitrogen and phosphorus pollution from a whole-watershed perspective in Oregon's coastal areas (e.g., Oregon DEQ 2007, pp.87-89).

\* \* \*

Proportional losses of nutrients into waters are dramatically higher with the initial disturbance of intact natural vegetation—as occurs with logging of even small areas of forest—than when vegetation is further altered in extensively-disturbed ecosystems such as croplands or urbanizing areas (Wickam et al., 2008).

\* \* \*

[I]ncreased area of logging or other forest disturbance in a watershed can dramatically increase nutrient loading to downstream waters compared to similar changes of disturbance on other land use types, where background losses are already quite high and sustained. For example, clearcut logging increased nitrogen loading to an adjacent stream by about 7-fold in one Idaho study, while partial cutting caused a more than 5-fold increase (Gravelle et al. 2009). Downstream of the cutting units, cumulative nitrogen concentrations increased from pre-logging background levels by about 450-500 percent.

*Declaration of Christopher Frissell, Ph. D.* (March 14, 2014) at 27-28. Therefore, Oregon's water pollution control programs, such as they are for nonpoint sources, can be used to limit ocean acidification. The foundation for any regulatory program is its water quality standards.

#### Other implementation of Water Quality Criteria

We would like DEQ to explain the purported “extensive permit delays” that have occurred due to the language of OAR 340-041-0061. “Confusion” is not desirable but NPDES permit “delays” sounds more to us like a reflection of DEQ's very basic reluctance to issue permits to sources that would have to spend money on pollution control upgrades. Reducing and then eliminating pollution is a goal of the Clean Water Act. DEQ needs to be very clear that in revising and/or moving this section it is not simply clearing a path to continued and additional pollution that otherwise would be prevented.

We disagree that all of these provisions are not water quality standards. For example, EPA requires compliance schedule provisions to be included in state water quality standards. The

provisions pertaining to how criteria are met in reservoirs are water quality standards. Minimum design criteria are, at least in some instances, related to the antidegradation policy, including its purpose and growth policy, its nondegradation policy, and exceptions thereto.

DEQ should be careful to not remove provisions from the water quality standards that elaborate on the requirements set out in OAR 340-041-0007, Statewide Narrative Criteria. For example, this section requires that “[n]otwithstanding the water quality standards contained in this Division, the highest and best practicable treatment and/or control of wastes, activities, and flows must in every case be provided so as to maintain dissolved oxygen and overall water quality at the highest possible levels and water temperatures, coliform bacteria concentrations, dissolved chemical substances, toxic materials, radioactivity, turbidities, color, odor, and other deleterious factors at the lowest possible levels.” Many of the provisions in OAR 340-041-0061 are linked to the concept of highest and best practicable treatment. We disagree with DEQ’s opinion that these provisions are not water quality standards.

#### **IV. High Priority Standards Not Included on DEQ’s Lists**

##### Thermal Refugia Protection

Protection of thermal refugia is not on DEQ’s list of priorities but, based on information and belief, we think it should be a high priority for this triennial review. As NWEA pointed out to the U.S. Environmental Protection Agency in 2013, one of the unintended consequences of DEQ’s adoption of temperature standards was permittees’ increasing interest in discharging heated effluent to hyporheic zones. *See* Letter from Nina Bell, NWEA, to Dan Opalski, EPA, *Use of Hyporheic Flows for the Cooling of Thermal Discharges* (July 26, 2013). These zones have been identified by EPA and others as critically important to moderating stream temperatures and providing thermal refugia, in stream nutrient cycling, and in creating unique habitats within streams. Yet in the past, and possibly to this day, DEQ has encouraged and likely issued permits to allow permittees to use hyporheic zones as discharge points. *See* DEQ, *Disposal of Municipal Wastewater Treatment Plant Effluent by Indirect Discharge to Surface Water via Groundwater or Hyporheic Water Internal Management Directive* (Sept. 2013). In contrast, EPA has concluded that “permitting of discharges to the hyporheic zone [is] inconsistent with the intent of the State’s water quality standards” for a variety of reasons it set out in a letter to DEQ. *See*, Letter from Christine Psyk, EPA, to Jennifer Wigal, DEQ, *Re: U.S. Environmental Protection Agency Concerns about Oregon Department of Environmental Quality’s (DEQ’s) Internal Management Directive (IMD) - Disposal of Municipal Wastewater Treatment Plant Effluent by Indirect Discharge to Surface Water via Groundwater or Hyporheic Water Internal Management Directive (DRAFT, dated September 2013)* (March 20, 2014). We believe that the best solution to the ambiguity that currently exists about whether permitting discharges in this fashion is protective of designated uses is for DEQ to adopt a rule that makes clear that it is unambiguously prohibited. At the same time, it would be appropriate for DEQ to also make clear that any alteration of thermal refugia is prohibited (by any and all sources).

Karen Williams  
August 15, 2017  
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### **Conclusion**

We appreciate this opportunity to comment on the priorities of DEQ as it enters this triennial review. We would be happy to provide further elaboration on any of the points made in this letter.

Sincerely,



Nina Bell  
Executive Director  
Northwest Environmental Advocates

Lauren Goldberg  
Staff Attorney  
Columbia Riverkeeper

Attachments: Pennsylvania Department of Environmental Protection, *Water Quality Antidegradation Implementation Guidance* (2003)

Letter from Nina Bell, NWEA, to Dan Opalski, EPA, and John King, NOAA, *Oregon Coastal Nonpoint Pollution Control Program; Protection of the Designated Use of Amphibians in Non-Fish-Bearing ("Type N") Streams Through the MidCoast Implementation Ready TMDL* (Oct. 5, 2012)

EPA, *The EPA's Review of Portions of Oregon's March 2001 Antidegradation Policy Implementation Internal Management Directive for NPDES Permits and Section 401 Water Quality Certifications* (August 8, 2013)

Memorandum from Jennifer Wigal, DEQ, to DEQ Water Quality Permit Writers and 401 Staff, Re: *Procedures for existing use review during antidegradation analysis* (Nov. 3, 2014).

DEQ, *Sediment Technical Working Group LSAC Update* (July 15, 2015)

DEQ, *Mid-Coast Sediment TMDL, Sediment Technical Working Group* (Jan. 14, 2015)



Letter from Nina Bell, NWEA, to Dick Pedersen and Greg Geist, DEQ, Re: *Petition for Reconsideration of May 15, 2012 Letter Approving Coverage Under the NPDES General Permit 2300A for the Fairview Lake Property Owners Association* (June 20, 2012);

NWEA, Before the Oregon Environmental Quality Commission, *Petition to Initiate Rulemaking and Take Other Actions to Protect Existing and Designated Uses of Fish and Wildlife From Point and Nonpoint Sources of Pesticides* (Aug. 9, 2012)

Letter from Richard Whitman, DEQ, et al. to Scott Pruitt, EPA (June 19, 2017).

*Declaration of Christopher Frissell, Ph. D.* (March 14, 2014)

Letter from Daniel D. Opalski, EPA, to Greg Aldrich, DEQ, *Re: Final Additions to Oregon's 2010 303(d) List* (Dec. 14, 2012)

Letter from Nina Bell, NWEA, to Dan Opalski, *Use of Hyporheic Flows for the Cooling of Thermal Discharges* (July 26, 2013)

Letter from Christine Psyk, EPA, to Jennifer Wigal, DEQ, *Re: U.S. Environmental Protection Agency Concerns about Oregon Department of Environmental Quality's (DEQ's) Internal Management Directive (IMD) - Disposal of Municipal Wastewater Treatment Plant Effluent by Indirect Discharge to Surface Water via Groundwater or Hyporheic Water Internal Management Directive (DRAFT, dated September 2013)* (March 20, 2014)

Oregon Department of Fish and Wildlife, *Oregon Conservation Strategy* (2016)

Oregon Department of State Lands, *Aquatic Resource Management Program Report, Fiscal Years 2015 and 2016* (2016).

EPA, NOAA, *NOAA/EPA Finding That Oregon Has Not Submitted a Fully Approval Coastal Nonpoint Program* (Jan. 30, 2015)

*Declaration of Jonathan J. Rhodes in Support of the U.S. Environmental Protection Agency's and the National Oceanic and Atmospheric Administration's Proposal to Disapprove the State of Oregon's Coastal Nonpoint Pollution Control Program* (March 14, 2014).