

Date: November 22, 2010

To: Environmental Quality Commission

From: Dick Pedersen, Director

Subject: Agenda item C, Informational item: DEQ's development of revised water quality standards and implementation policies for toxic pollutants
December 9-10, 2010, EQC meeting

Purpose of item DEQ will update the commission on the development of rules and other approaches for implementing revised human health water quality standards for toxic pollutants, which DEQ expects to propose for adoption in mid 2011.

Why this is important To meet the environmental objectives of water quality standards, DEQ must have implementation tools that facilitate cost-effective environmental improvement for permitted sources, even when the attainment of the water quality standard is uncertain or infeasible. DEQ must also develop strategies to reduce or control inputs of these pollutants into Oregon waters if they are not being addressed through existing permitting programs or other mechanisms.

Background DEQ's current human health toxics criteria are based on a fish consumption rate that does not provide adequate protection for the amounts of fish and shellfish that Oregonians eat. On June 1, 2010, EPA disapproved Oregon's human health toxics criteria that were submitted for approval in 2004 and were based on a fish consumption rate of 17.5 grams per day. EPA disapproved the human health toxics criteria because the fish consumption rate used to calculate the criteria is not sufficiently protective of the fish consumption levels among Oregon's population. As a consequence of EPA's disapproval, the majority of currently effective human health criteria have reverted back to criteria from the 1980s based on fish consumption of 6.5 grams per day. DEQ is addressing EPA's disapproval by proposing to use a higher, more protective fish consumption rate of 175 grams per day in its calculation of human health toxics criteria. If DEQ does not promulgate revised standards in a timely manner addressing EPA's disapproval, EPA must conduct rulemaking to promulgate human health toxics criteria for Oregon. The resultant water quality standards, either set by DEQ or EPA, are the basis of regulatory tools used by DEQ and EPA to prevent or reduce water pollution.

Revising the criteria to include a fish consumption rate of 175 grams per day would make Oregon's criteria significantly more protective of human health than any other state or federal criteria, which are based on consumption rates of 6.5 to 33 grams per day.

EQC directed DEQ to pursue rule revisions that will set new water quality standards for toxic pollutants in Oregon based upon on a revised fish consumption rate of 175 grams per day. The commission also directed DEQ to propose rule language or develop other implementation strategies to reduce the adverse impacts of toxic substances in Oregon's waters that are the result of nonpoint source discharges or other sources not subject to permitting. The proposed rule language must allow DEQ to implement the standards in an environmentally meaningful and cost-effective manner.

Key issues

Finalizing the rule package for public comment

Since the last update in August, DEQ has worked with stakeholder workgroups to develop and finalize the rule package as instructed by the commission. DEQ completed discussions with the stakeholder workgroups at an Oct. 4, 2010, workgroup meeting and conducted internal review during November. The rule package includes proposed rule language, information on fiscal and economic impact, required forms, and other supporting documents. The final rule package will be shared with the stakeholder workgroups December 2 and is scheduled to be available for public review and comment in January 2011.

Summary of proposed rule revisions

DEQ developed supporting issue papers for the following topics to evaluate rulemaking options, to document discussions with the workgroups, and to provide supporting analysis and documentation of proposed rule provisions. DEQ concluded that the following items should be addressed through revised rules.

- **Human health toxics criteria:** Revision of numeric criteria based on a fish consumption rate of 175 grams per day.
- **Intake credits:** New permitting provision to account for background pollutants that are present in a discharger's intake water.
- **Background pollutant allowance:** New standards provision that allows a certain amount of concentration increase in the ambient concentration resulting from certain discharges, as long as mass is not increased and the ambient concentration does not exceed a 10^{-4} risk level value.
- **Variance provision:** Revised standards provision that

establishes alternate requirements and a pollutant reduction plan for a discharger when it demonstrates that limits based on water quality standards cannot be met based on at least one of six justification factors. Variances require EPA approval.

- **Nonpoint source pollution:** Revision of rules related to agriculture and forestry to clarify DEQ's regulatory authority to control nonpoint sources of pollution.
- **Total maximum daily loads (TMDLs):** Revision of rule related to assigning load allocations to clarify DEQ's authority to allocate loads to air and land sources in TMDLs.

Fiscal and economic impact

Fiscal impact analysis for this rulemaking relies on information generated by an EPA contractor in 2008 and input from DEQ staff and stakeholders. Generally, the general public, small and large businesses, communities, and public agencies are potentially impacted directly or indirectly by the proposed criteria changes. Specifically, DEQ may require modifications to wastewater discharge permits and the use of various implementation tools, and to certifications for sediment removal and fill activities and hydroelectric operations to comply with the revised criteria. The new criteria may result in DEQ listing more waterbodies as impaired. In order to address these impairments, both point and nonpoint sources may be subject to more stringent requirements. The revised criteria may alter the management practices required to control discharges from nonpoint sources, including those subject to TMDLs established for water quality limited waterbodies.

Other supporting documents

DEQ developed supporting issue papers on pretreatment source control, sediment control, "implementation ready" TMDLs and Oregon's antidegradation policy to evaluate whether any actions assessed in the issue papers should be included as part of the rulemaking package. DEQ concluded that additional issues identified relative to TMDLs and antidegradation should be addressed through internal management directives and other issues should be implemented through other agency-wide toxics prevention and reduction efforts.

Stakeholder perspectives on rulemaking package

DEQ assembled workgroups to solicit input on this rulemaking effort. The groups included representatives from industry, cities, environmental groups, a tribe, agriculture and forestry. Some of the stakeholder concerns have been addressed; however, a few outstanding issues remain:

- Sufficient tools must be available to address situations likely to be encountered by point source dischargers;

- Implementation tool provisions must be effective and efficient without prohibitive procedural costs to regulated sources or DEQ;
- Point source implementation tools must conform to federal requirements;
- Requirements should be in place for all potential sources to meet water quality standards, and implementation tools should ultimately lead to achieving water quality standards;
- The background pollutant allowance does not protect human health because it allows an incremental increase regardless of the background concentration and there is nothing that would prevent increases from multiple sources to cumulatively cause a significant increase;
- An internal management directive on variances should be completed before the rulemaking goes out for public comment, given that variances will most likely be the only tool available to municipalities; and
- Potential consequences and impacts should be considered before clarifying in rule that load allocations could be assigned to air sources.

Next steps DEQ plans to solicit public comment on draft proposed rules in January and February, 2011 and expects to hold six to eight public hearings around the state. DEQ plans to propose rules to the commission for action in summer of 2011.

EQC involvement DEQ will continue to provide informational updates on the progress of this rulemaking at the pleasure of the commission.

Attachments A. Proposed rule language package
B. Crosswalk between current criteria and proposed criteria

Available upon request Draft issue papers related to this rulemaking

Approved:

Division: _____

Section: _____

Report prepared by: Koto Kishida
503- 229-6381