

Lake Whatcom Total Phosphorus and Bacteria TMDL Clarifications

The Lake Whatcom Watershed Total Phosphorus and Bacteria Total Maximum Daily Loads Water Quality Improvement Report and Implementation Strategy (November 2014 – Publication No. 13-10-012), hereafter “TMDL,” is clarified as follows:

1. Ecology will accept, but not require, elements of the 2015-2019 Lake Whatcom Management Program in fulfillment of the TMDL plans required to be prepared within six months of EPA approval of the TMDL as described in page 42 of the TMDL.
2. With regard to future implementation plans and budgets as set forth on pages 42 and 43 of the TMDL, Ecology will approve those plans and budgets if they are consistent with the Lake Whatcom Management Program commitments and if they are based on reasonable timelines and reasonable budget and funding assumptions.
3. Pages 46-48 of the TMDL (“Adaptive Management”) is clarified as follows: The TMDL indicates that the model will be updated and a new loading capacity will be calculated in 2023 as part of Ecology’s continuous improvement model (see Table 11). Ecology welcomes early submission of updates. Ecology is pleased that the work on the improvements to the model is already progressing at a rapid pace. Whatcom County has requested an opportunity and Ecology has agreed to allow the County to present revised models and results prior to the 2023 deadline. Ecology will incorporate the results of new modeling data and information into the TMDL process and revise the Waste Load and Load Allocations based on the updated models within one year from the date the information becomes available. Thereafter, Ecology intends to revise the TMDL as often as every 10 years to incorporate subsequent model information. The reassessment process will also evaluate the feasibility of meeting TMDL targets using planned

stormwater treatment technology and best management practices appropriate to site and watershed conditions. Also to be evaluated is the ability to meet Waste Load Allocations and Load Allocations, and the TMDL's assumptions about practices based on the updated models, completed and planned implementation activities, monitoring, and other relevant information. After each 10-year evaluation, if the equivalent levels of control referenced in paragraph 5 below demonstrate continuous improvement as set forth in this paragraph 3, then Ecology will not expand the coverage/boundary area beyond the Municipal Stormwater Permit coverage area if Whatcom County continues to apply the equivalent levels of control set forth in paragraph 5 below. After each 10-year evaluation, if continuous improvement is not demonstrated by the equivalent levels of control referenced in paragraph 5 below, then recommendations will be made for additional actions (if any) beyond those described in paragraph 5 below, necessary to meet equivalent levels of control. Ecology's review of Whatcom County and City of Bellingham Quality Assurance Project Plans will provide additional opportunities to communicate and coordinate with Ecology on future data gathering and evaluation of that data. When all planned practices are in place or can be accurately modeled, Ecology will evaluate the feasibility of meeting the Water Quality Standards. Ecology plans to incorporate the timelines in Table 11 into the applicable Municipal Stormwater Permit.

4. The Lake Whatcom TMDL addresses both phosphorus and bacteria through the development of Load and Waste Load allocations. For phosphorus, these allocations are expressed as pounds of phosphorus per day, and for bacteria these allocations are expressed as the number of "colony forming units" per day. For each of these pollutants, Ecology has also developed implementation targets. For phosphorus, the targets are

expressed as “effective developed acres.” For bacteria, the targets are expressed as a Target geometric mean concentration. These targets are not Load or Waste Load Allocations and targets do not need to be met. Instead targets provide a guide to evaluate progress being made towards attaining the water quality standards. Ecology acknowledges that there may be other ways to demonstrate that progress is being made and that the Waste Load and Load Allocations are being met, but Ecology has chosen these targets because they appear to be the simplest way to demonstrate compliance with the Waste Load and Load Allocations. Meeting water quality standards, meeting the Waste Load allocations, or meeting the targets constitutes compliance with the TMDL.

5. The County’s Municipal Stormwater Permit coverage/boundary area will not be expanded beyond the current Municipal Stormwater Permit coverage/boundary area to implement the TMDL if Whatcom County applies equivalent levels of control to the non-permit areas. For non-point sources outside of the Municipal Stormwater Permit coverage/boundary area, the County is implementing equivalent levels of control by implementing the low impact development phosphorus neutral design standards contained in the Lake Whatcom Watershed Overlay Ordinances (WCC 20.51); Illicit Discharge, Detection and Elimination Ordinance (WCC 16.36); and Outreach and Education measures. For point source discharges to the County’s municipal separate storm sewer system that are outside of the Municipal Stormwater Permit coverage/boundary area, the County is implementing equivalent levels of control by implementing the low impact development phosphorus neutral design standards contained in the Lake Whatcom Watershed Overlay Ordinances (WCC 20.51); Illicit Discharge, Detection and Elimination Ordinance (WCC 16.36); Outreach and Education

measures; conducting inspections and maintenance of municipal publicly-owned stormwater infrastructure as required in the Municipal Stormwater Permit coverage/boundary area and modifying the inspection schedule specified in Condition S5C.5.d. of the Municipal Permit for municipal publicly-owned catch basins and inlets in the Geneva, Hillsdale, and Sudden Valley portions of the permitted areas of Lake Whatcom to every 18 months. Whatcom County will otherwise adhere to the Municipal Stormwater Permit conditions with regard to maintenance and inspection in the Geneva and Hillsdale areas, including potentially changing to a less frequent inspection schedule as allowed under Condition S5.C.5.d.i of the Permit.

6. Areas zoned commercial forest, including the DNR lands recently reconveyed to Whatcom County, will remain outside of the Municipal Stormwater Permit coverage/boundary area. The Waste Load and/or Load Allocations for these areas will be presumed to be meeting the TMDL Targets so long as the commercial forest remains undeveloped, other than for passive recreation. If development other than passive recreation occurs in the commercial forest, provided that the developed area is built to the phosphorus neutral design standards included in the Lake Whatcom Watershed Overlay Ordinance (WCC 20.51) and maintained, then the developed area will remain outside of the Municipal Stormwater Permit coverage/boundary area.