

**Department of Natural Resource**

Cathy Stepp  
Secretary



DNR Division of Water

**Department of Health Services**

Dennis G. Smith  
Secretary

**State of Wisconsin**

Scott Walker  
Governor

DHS Division of Public Health

Date: January 2, 2013

To: Wisconsin Public Water Systems

From: Henry A. Anderson, MD, State Health Officer and Lee H. Boushon, Public Water Supply Section Chief

RE: Community Water Fluoridation for Wisconsin Public Water Systems

The US Department of Health and Human Services (HHS) has released a notice proposing a change to the recommended optimal fluoride level in drinking water. In response to this proposed change, the Oral Health Program (OHP) in the Department of Health Services (DHS) and the Public Water Supply Section in the Department of Natural Resources (DNR), have established guidance for Wisconsin Public Water Systems (PWS) that participate in community water fluoridation.

Community water fluoridation (CWF) is consistently identified as an effective public health strategy to improve oral health. HHS's recommendation relating to the optimal level of fluoride for PWS is based upon the latest scientific data and research. The new recommendation is the lowest effective level of fluoride that will still ensure optimal benefits are achieved. There is no change in federal health officials' strong support regarding the value and safety of fluoride in drinking water.

PWS need to be aware of the DNR requirements for fluoride and chemical injection prior to making any changes to chemical feed levels to comply with the new recommendation. Water operators should discuss the changes with their local DNR Water Supply Engineer prior to adjusting fluoride feed rates to make sure that current chemical feeders and storage tanks can be used to remain in compliance with administrative code. The following are the DNR requirements:

- 1) NR 809.11(2) establishes a Primary Maximum Contaminant Level (MCL) of 4.0 mg/L for fluoride.
- 2) NR 809.70(1) establishes a Secondary Maximum Contaminant Level (SMCL) of 2.0 mg/L for fluoride.
- 3) NR 809.74(1)(a) requires that water systems adding fluoride have a routine monitoring program to ensure the levels of fluoride in the water system fall within the optimal range of fluoride established by the Department of Health Services.
- 4) NR 811.39(2) (c) contains chemical feeder design requirements including allowable chemical feeder settings.
- 5) NR 811.40(1) (d) contains chemical feed storage tank requirements including maximum solution tank sizes.

Effective February 1, 2013 the DHS recommended optimal level of fluoride for PWS is 0.70 mg/L. To ensure that PWS are consistently providing a fluoride level that has the greatest benefit, a recommended fluoride concentration control range has been established. Following guidance from the Centers for Disease Control and Prevention (CDC), it is recommended that Wisconsin PWS:

- 1) Have an average monthly fluoride concentration of at least 0.70 mg/L.
- 2) Have 75% of daily samples within the recommended control range of 0.60 mg/L to 0.80 mg/L.
- 3) Submit monthly split samples to the state lab for testing that correlate with a split tolerance of +/- 0.20 mg/L.
- 4) Continue fluoridation of the PWS unless the system has natural fluoride levels of 0.60 mg/L or above.

Additional information regarding the HHS proposed change can be found at <http://www.cdc.gov/fluoridation>. For more information on DNR administrative code, equipment needs, and reporting requirements, please contact your local DNR Water Supply Engineer. For more information on the recommended optimal fluoride level, CDC guidelines, or the benefits and safety of community water fluoridation, please contact Robbyn Kuester, DHS Fluoridation Program Coordinator, at 608-266-0876 or [robbyn.kuester@wisconsin.gov](mailto:robbyn.kuester@wisconsin.gov).

Sincerely,



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State Health Officer  
Department of Health Services



Lee H. Boushon, Chief  
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