

Fluoridation

Health Benefits: (Source CDC)

- Since 1945, people in the United States have benefited from drinking water with fluoride.
- Drinking fluoridated water keeps teeth strong and reduces tooth decay by approximately 25 percent in children and adults.
- The Community Preventive Services Task Force strongly recommends community water fluoridation for the prevention and control of tooth decay, **the most common chronic disease in children**.
- Community water fluoridation is supported by the American Dental Association, American Academy of Pediatrics, U.S. Public Health Service, and the World Health Organization.
- Community water fluoridation is the single most effective public health measure to prevent tooth decay, and the CDC named it 1 of the 10 great public health achievements of the 20th century.

Costs: (Source CDC)

- Community water fluoridation is the most cost-effective method of delivering fluoride to all members of the community, regardless of age, educational attainment, or income level.
- By preventing tooth decay, community water fluoridation saves money for both families and the healthcare system.
- Widespread community water fluoridation prevents cavities even in neighboring communities that are not fluoridated.

Fluoride Levels:

Optimal fluoride level for good oral health = 0.7 mg/L (milligrams per liter)

Exceedance levels:

- 2.0 mg/L – National Secondary Drinking Water Standard – Exceeding this level may cause cosmetic effects in developing teeth of children and requires public notice.
- 4.0 mg/L – National Primary Drinking Water Standard – Maximum Contaminant Level – Exceeding this level may cause bone disease and requires public notice.



Operational Requirements:

Analyze the water twice a day for fluoride content, both before and after fluoridation.

- Submit fluoridation monthly operational reports (MORs) to both DEQ and the Oklahoma State Department of Health. DEQ form No. 631-001 is available on DEQ's website at:
<https://tinyurl.com/253f3h62>
- Perform monthly check samples of post-fluoridation water by comparing water plant lab results to that of a state accredited lab analysis of the water.
 - When difference is greater than 0.2 mg/L, take steps necessary to improve accuracy of the water plant lab results.
 - Ensure that a copy of the analytical report is forwarded to the Oklahoma State Department of Health.

Systems that intend to implement fluoridation must:

- Submit plans and specifications to DEQ and obtain a construction permit.
- Notify DEQ in writing when fluoridation has been discontinued and when it will be started again.

DEQ's Construction Standards and Operational Regulations can be found on DEQ's website.

- **252:626 Public Water Supply Construction Standards**
<https://www.deq.ok.gov/wp-content/uploads/deqmainresources/626.pdf>
- **252:631 Public Water Supply Operation**
<https://www.deq.ok.gov/wp-content/uploads/deqmainresources/631.pdf>

For more information on community water fluoridation, contact:

Oklahoma State Department of Health
Dental Health Service
123 Robert S. Kerr Ave., Ste. 1702
Oklahoma City, OK 73102
FluorideReports@health.ok.gov
(405) 426-8460

Visit the My Water's Fluoride webpage at:
https://nced.cdc.gov/DOH_MWF/Default/Default.aspx