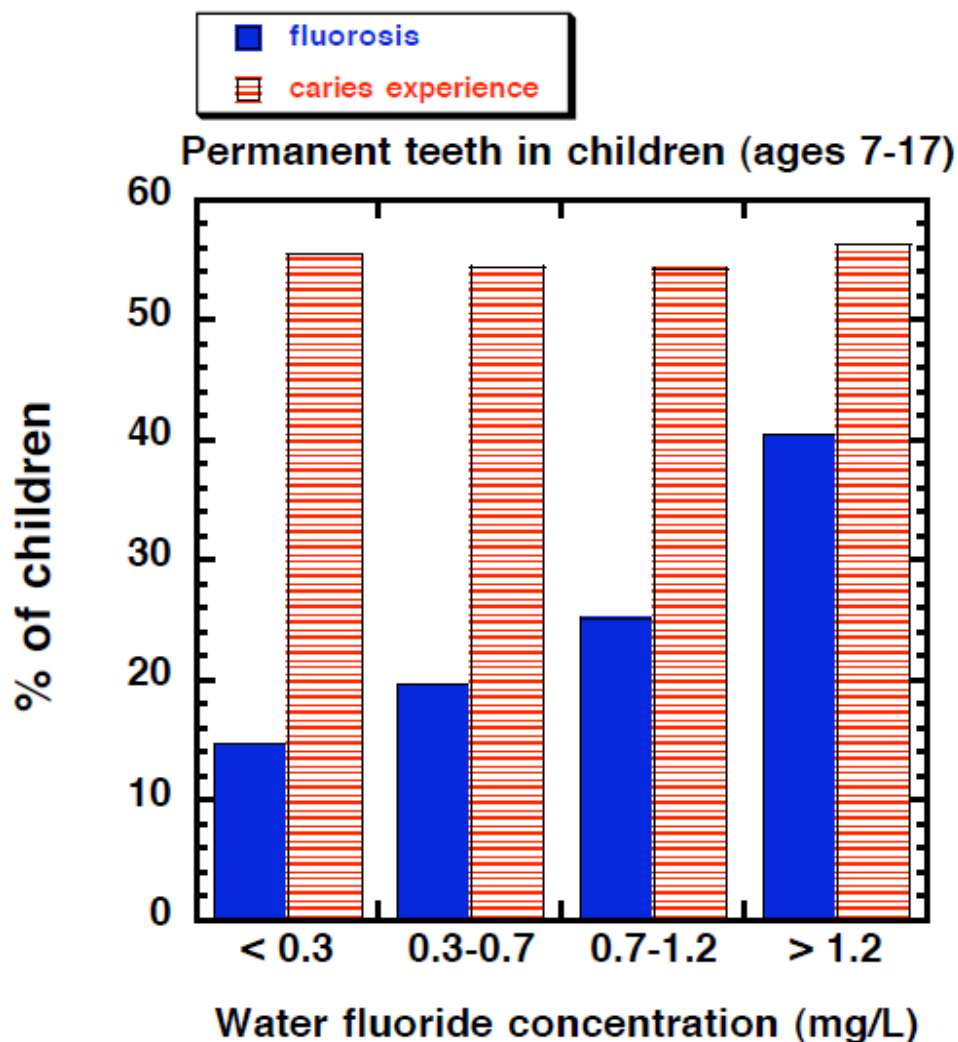


# Artificial Water Fluoridation No Benefit - Definite Harm

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Two recent papers, whose authors include members of Health Canada's expert panel, clearly show no dental health benefit from ingested fluoride.



**#1.** No difference in caries rates in the permanent teeth of children is seen with different water fluoride levels. Fluorosis prevalence and caries prevalence with water fluoride concentration for children ages 7-17 with a history of a single continuous residence is provided.

Data are shown as % of total children having fluorosis (very mild, mild, moderate, or severe, but not questionable) or caries experience. National data set collected in the U.S. in 1986-1987 (more than 16,000 children, ages 7-17, with a history of a single continuous residence).

Source: Iida, H., and Kumar, J.V. 2009. *The association between enamel fluorosis and dental caries in U.S. schoolchildren. JADA 140:855-862.*

Table 1. Caries prevalence and fluorosis prevalence with water fluoride concentration.<sup>a</sup>

Water fluoride concentration mg/L	Children with caries %	Children with fluorosis <sup>b</sup> %
< 0.3	55.5	14.6
0.3-0.7	54.6	19.6
0.7-1.2	54.4	25.2
> 1.2	56.4	40.5

<sup>a</sup> Data for permanent teeth of children ages 7-17, calculated from data provided in Table 1 of Iida and Kumar (2009).

<sup>b</sup> Includes very mild, mild, moderate, and severe fluorosis, but not “questionable.”

**#2.** The single study that has examined caries experience in relation to individual fluoride intakes at various ages during childhood (the Iowa study) has found no association between fluoride intake and caries experience; caries rates (% of children with or without caries) at ages 5 and 9 were similar for all levels of fluoride intake.

Source: Warren JJ, Levy SM, Broffitt B, Cavanaugh JE, Kanellis MJ, Weber-Gasparoni K. 2009. *Considerations on optimal fluoride intake using dental fluorosis and dental caries outcomes—A longitudinal study. J Public Health Dentistry 69:111-115.*

The authors state:

- “the benefits of fluoride are mostly topical”
- “findings suggest that achieving a caries-free status may have relatively little to do with fluoride *intake*” (emphasis in the original).
- Given the overlap among caries/fluorosis groups in mean fluoride intake and extreme variability in individual fluoride intakes, firmly recommending an “optimal” fluoride intake is problematic. (Warren et al. 2009).