

HISTORIES OF GUIDELINE DEVELOPMENT FOR THE FOURTH EDITION

12. Chemical fact sheets

12.1 Chemical contaminants in drinking-water

Boron

History of guideline development

The 1958, 1963 and 1971 WHO *International Standards for Drinking-water* did not refer to boron. In the first edition of the *Guidelines for Drinking-water Quality*, published in 1984, it was concluded that no action was required for boron. A health-based guideline value of 0.3 mg/l for boron was established in the 1993 Guidelines, while noting that boron's removal by drinking-water treatment appears to be poor. This guideline value was increased to 0.5 mg/l in the addendum to the Guidelines published in 1998 and was designated as provisional because, with the treatment technology available, the guideline value would be difficult to achieve in areas with high natural boron levels. This guideline value was brought forward to the third edition of the Guidelines, published in 2004. In the fourth edition of the Guidelines, published in 2011, the guideline value was raised to 2.4 mg/l, and its provisional designation was removed.