

addition to the currently approved 19th editions and the proposed 20th edition.

Section 6251 includes method 6251 B for HAA5. The method has been updated for the On-Line Version to include precision and accuracy data from the Information Collection Rule and the sample holding time has been extended from 9 days to 14 days. The additional quality control data does not technically change the method from the previously approved version in the 19th edition; it simply demonstrates the performance that can be expected when the method is used. The change in sample holding time is consistent with EPA's proposal to standardize the HAA5 sample holding time at 14 days (See discussion in section V.O.7). Thus EPA is proposing to cite the On-Line Version for this analysis in addition to the currently approved 19th edition and the proposed 20th edition.

Section 5910 includes method 5910 B for determining UV₂₅₄. The method has been updated for the On-Line Version to include precision data from the Information Collection Rule. Because the additional quality control data does not technically change the method from the previously approved version in the 19th edition, EPA is proposing to cite the On-Line Version for this analysis in addition to the currently approved 19th edition and the proposed 20th edition.

The On-Line Version of *Standard Methods* will not include method 4500-ClO₂ D, so it is not being proposed with the other twelve methods cited in the On-Line Version.

EPA is proposing to add a citation to the 20th edition and the On-Line Version of *Standard Methods* for thirteen and twelve methods, respectively. EPA believes these should be cited in addition to the 19th editions in order to allow flexibility for the water systems performing the analyses. Withdrawal of the older editions would require all systems to purchase one of the newer editions, which could impose an unnecessary burden on systems that use the reference for only a few methods.

6. What Is the Updated Citation for EPA Method 300.1?

EPA Method 300.1 (USEPA 2000l) for bromate, chlorite and bromide is now included in an EPA methods manual that was published August 2000. The manual titled "Methods for the Determination of Organic and Inorganic Compounds in Drinking Water" is a compilation of methods developed by EPA for drinking water analyses. EPA Method 300.1 was previously only available as an individual method. EPA proposes to update the bromate,

chlorite, and bromide citation for this method to the August 2000 methods manual in today's rule so that the users are directed to the correct source of the method.

7. How Is the HAA5 Sample Holding Time Being Standardized?

The analytical methods approved for HAA5 compliance monitoring (EPA 552.1, EPA 552.2, and Standard Method 6251 B) all specify the use of ammonium chloride to eliminate the free chlorine residual in samples and they require samples be iced/ refrigerated after collection. Even though the sampling parameters agree in the three methods, the methods specify different sample holding times (time between sample collection and extraction). EPA Methods 552.1 (USEPA 1992) and 552.2 (USEPA 1995) allow at least 14 days while Standard Method 6251 B (APHA 1995 and 1998) specifies that samples must be extracted within nine days of sample collection. The holding time for the Standard Method is based on data which indicated an increase in DCAA concentration to slightly greater than 120% of the initial concentration after the sample was stored for 14 days (Krasner *et al.* 1989). All other HAA5 compounds were well within the 80–120% criteria set by the researchers. The decision was made to use a conservative approach to be sure that the concentrations of all HAAs were stable, and nine days was the closest data point to the 14 day–data point in question. Subsequent to Krasner's study, EPA conducted additional sample holding time studies as part of the EPA methods development process. EPA has published data to support the 14–day sample holding time for the HAA5 compounds (Pawlecki–Vonderheide *et al.* 1997; USEPA 2003p). Since there is no technical reason for the holding times to be different between the HAA5 methods addressed in this rule, EPA proposes to allow a 14–day sample holding time for samples being analyzed by Standard Method 6251 B. This would provide consistency across methods and it would simplify sampling considerations for water systems. EPA is only proposing to standardize the holding time allowed for the samples. Due to differences in the sample preparation (*i.e.*, extraction) procedures in the various methods, the extract holding times cannot be standardized. Laboratories must follow the individual method requirements when determining storage conditions and holding times for the extracts.

EPA Method 552.1 specifies a 28–day holding time for HAA samples. This

was based on studies conducted on fortified reagent water samples rather than drinking water samples. Because HAAs have been shown to biodegrade in some distribution systems (Williams *et al.* 1995), EPA believes that some samples may not be stable for 28 days. Today's rule proposes reducing the holding time to 14 days when EPA Method 552.1 is used in order to better ensure sample stability. During the Information Collection Rule, EPA only allowed the 14–day sample holding time for all HAA samples (regardless of the method used to analyze the samples), so laboratories and water systems have demonstrated their capability to implement this method change.

EPA believes that by standardizing the sample holding times allowed in the various HAA5 methods, the burden for laboratories and water systems will be reduced. Sampling considerations will be simplified, because all HAA5 samples will be collected and stored the same way.

8. How Is EPA Clarifying Which Methods Are Approved for Magnesium Determinations?

The Stage 1 DBPR allows systems practicing enhanced softening that cannot achieve the specified level of TOC removal, to meet instead one of several alternative performance criteria, including the removal of 10 mg/L magnesium hardness (as CaCO₃) from the source water. Analytical methods for measuring magnesium hardness were not included in the rule, but they were later promulgated in a Methods Update Rule (USEPA 1999b). The December 1999 Methods Rule cited the magnesium methods at § 141.23(k)(1), but it did not identify that these methods were to be used to demonstrate compliance with the alternative performance criteria specified in § 141.135(a)(3)(ii). EPA is proposing to clarify this today by referencing the approved magnesium methods at § 141.131(d)(6) and § 141.135(a)(3)(ii).

9. Which Methods Can Be Used To Demonstrate Eligibility for Reduced Bromate Monitoring?

Today's rule proposes to change the monitoring requirements for demonstrating eligibility to reduce bromate monitoring from monthly to quarterly. The Stage 1 DBPR allows the monitoring to be reduced if the system demonstrates that the average source water bromide concentration is less than 0.05 mg/L based upon monthly bromide measurements for one year. Today's rule proposes to change that requirement to a demonstration that the finished water