Appendix F. Quality Assurance and Quality Control Figures.

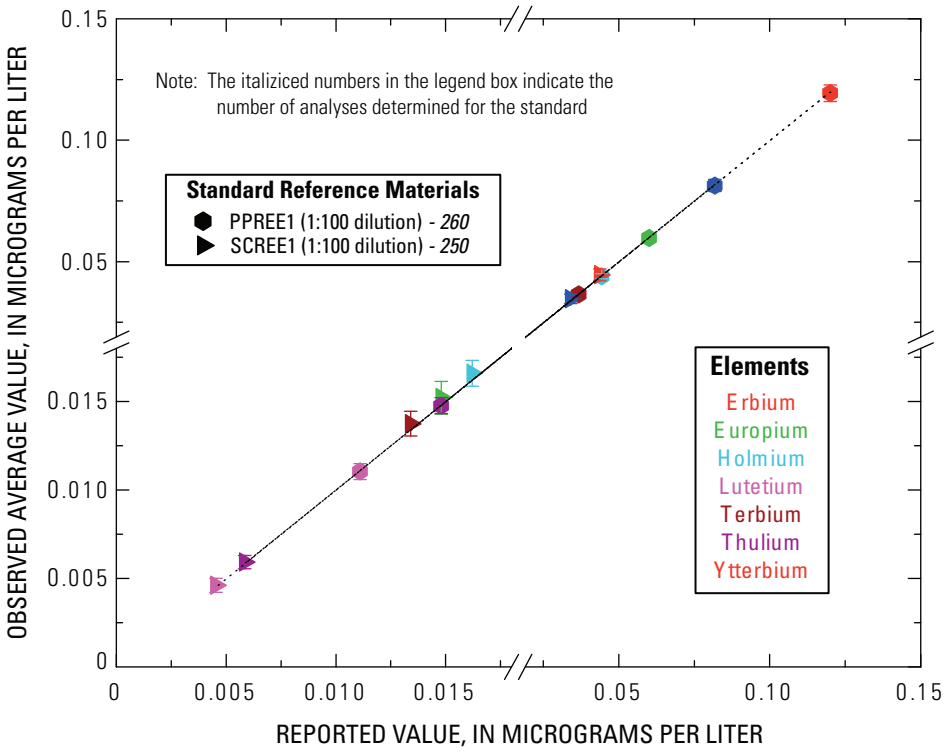

Figure F1. Correlation plot of observed values versus reported values for erbium, europium, holmium, lutetium, terbium, thulium, and ytterbium determined in standard reference materials.

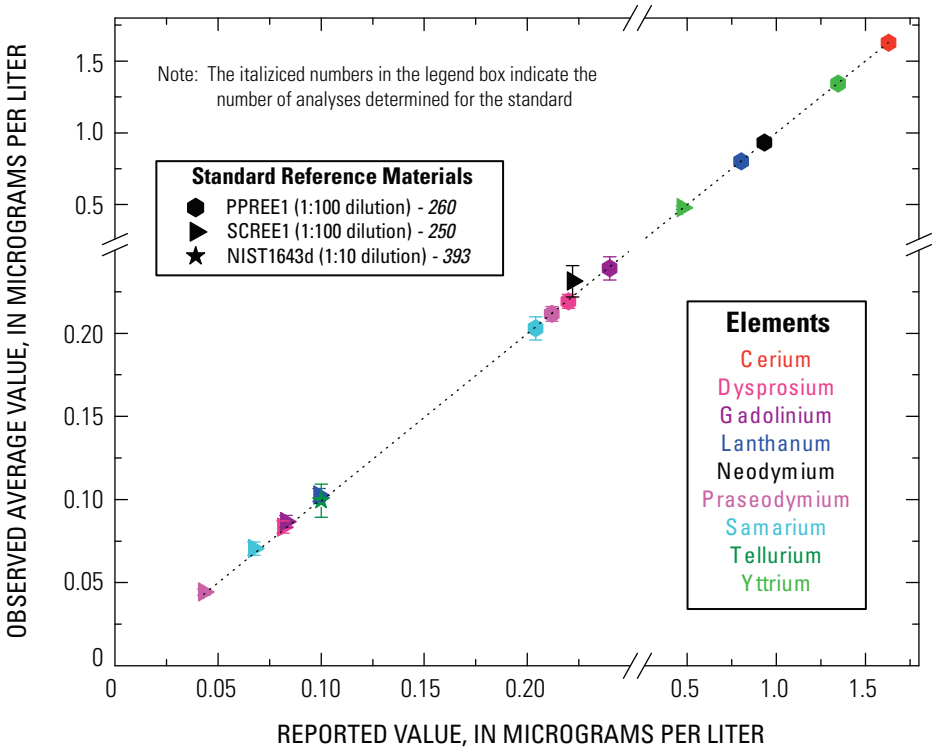

Figure F2. Correlation plot of observed values versus reported values for cerium, dysprosim, gadolinim, lanthanum, neodymium, praseodymium, samarium, tellurium, and yttrium determined in standard reference materials.

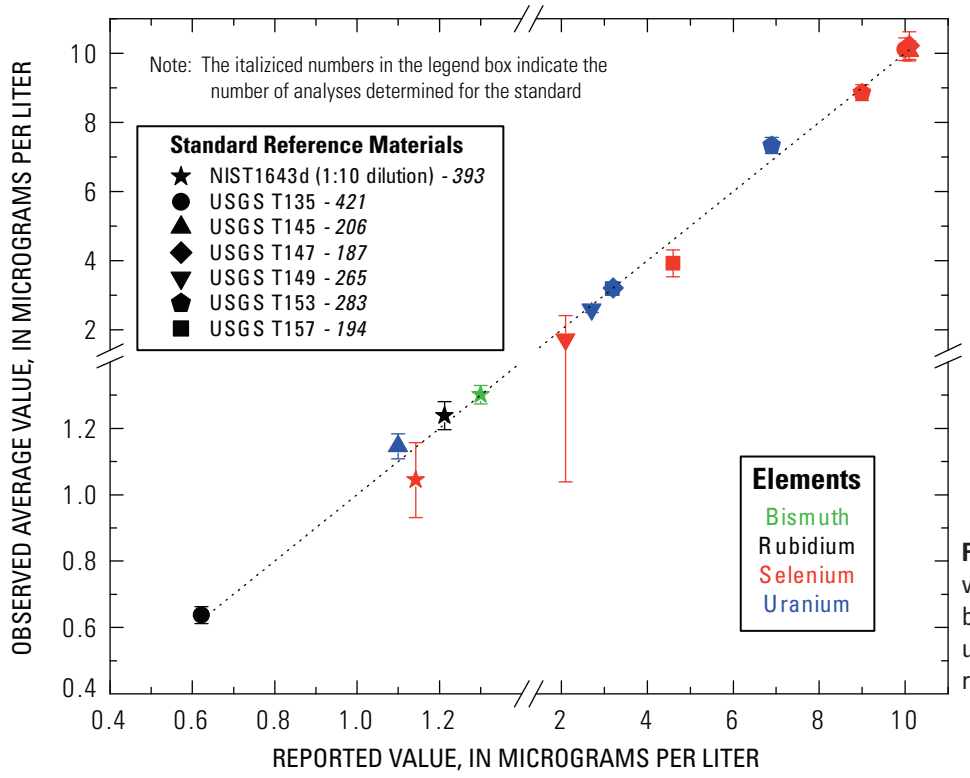

Figure F3. Correlation plot of observed values versus reported values for bismuth, rubidium, selenium, and uranium determined in standard reference materials.

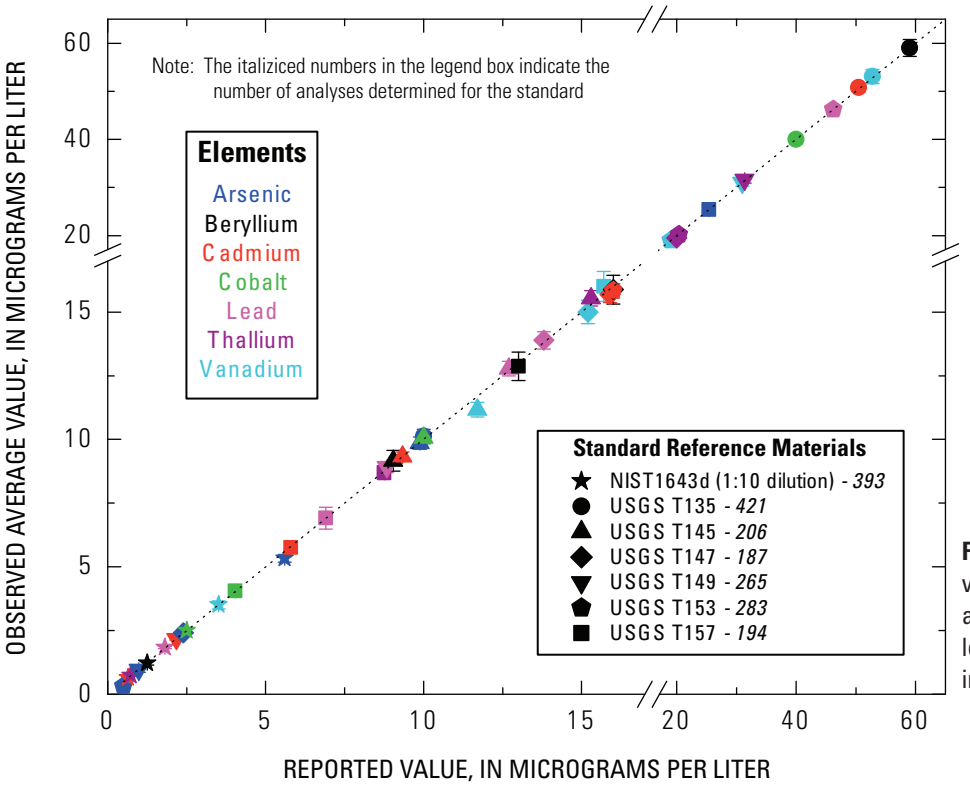

Figure F4. Correlation plot of observed values versus reported values for arsenic, beryllium, cadmium, cobalt, lead, thallium, and vanadium determined in standard reference materials.

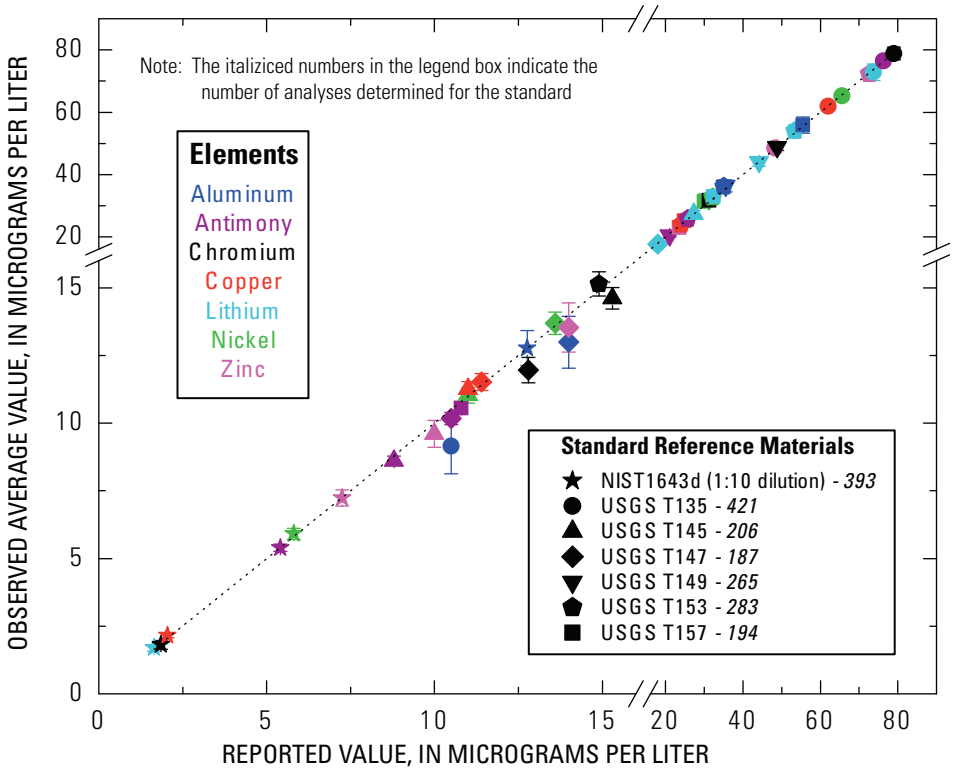

Figure F5. Correlation plot of observed values versus reported values for aluminum, antimony, chromium, copper, lithium, nickel, and zinc determined in standard reference materials.

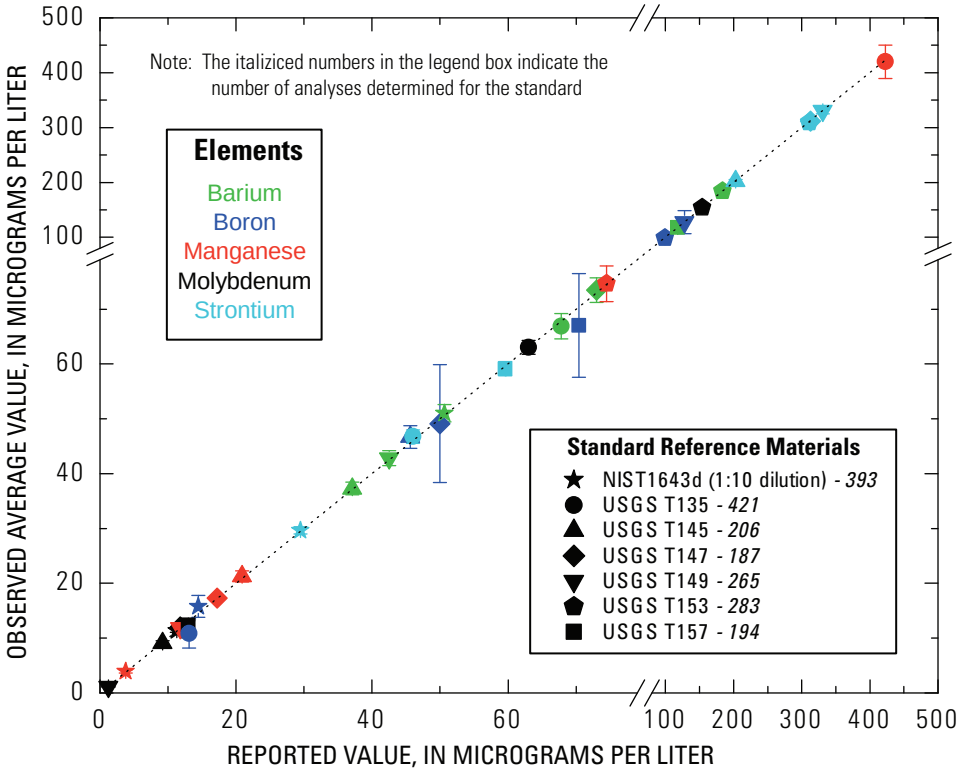

Figure F6. Correlation plot of observed values versus reported values for barium, boron, manganese, molybdenum, and strontium determined in standard reference materials.

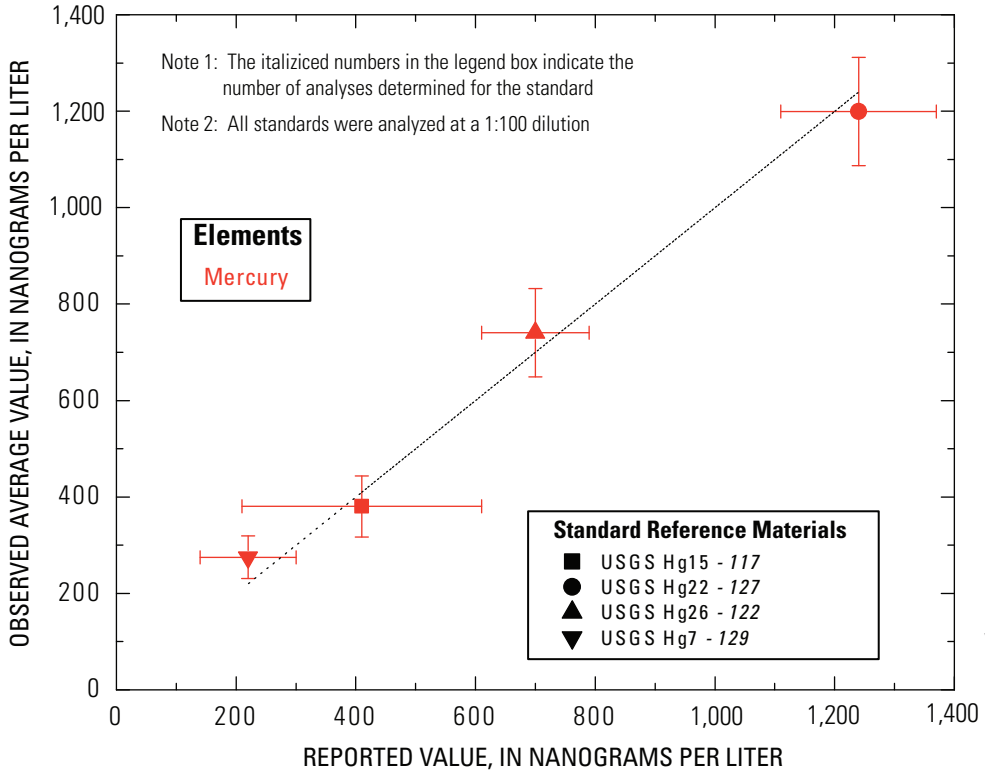

Figure F7. Correlation plot of observed values versus reported values for mercury determined in standard reference materials.

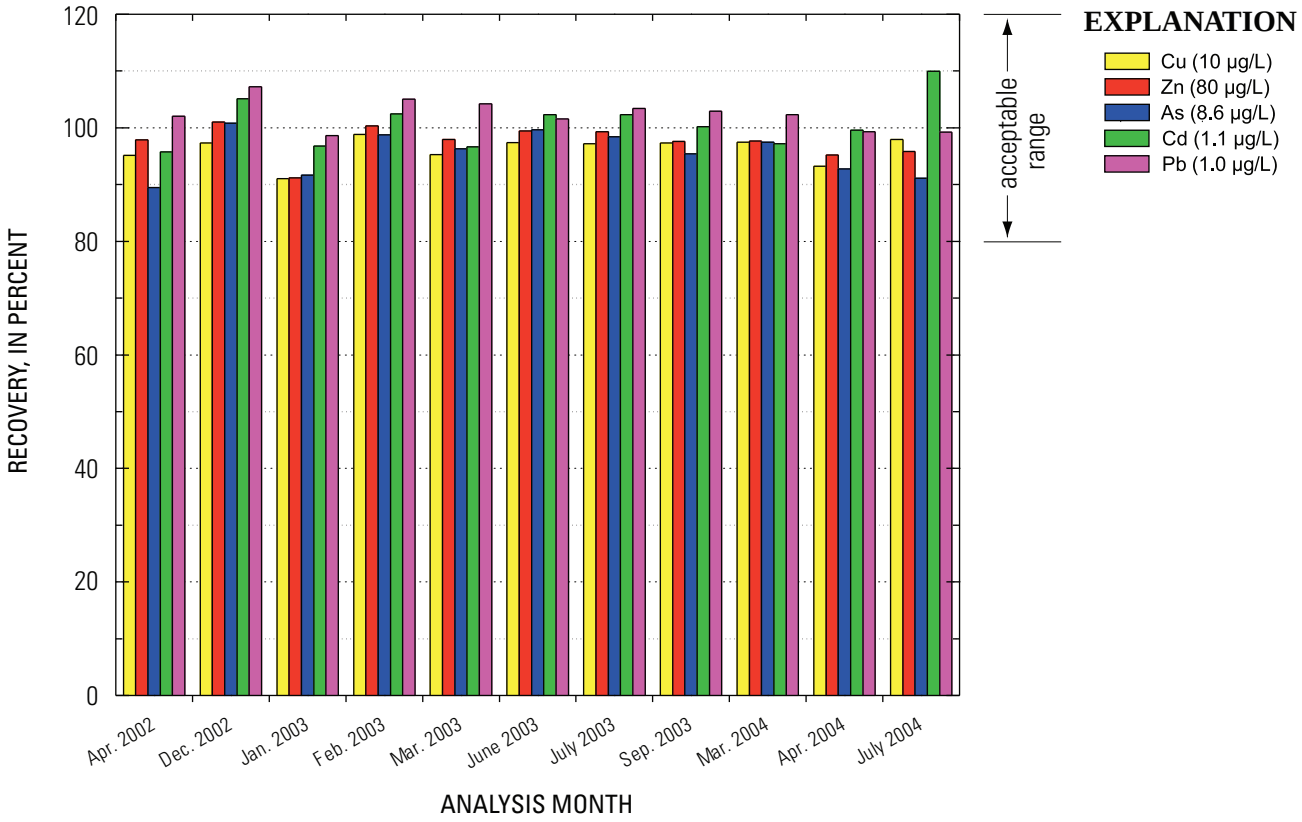

Figure F8. Bar graph plotting recovery (in percent) for arsenic (As), cadmium (Cd), copper (Cu), lead (Pb), and zinc (Zn) spiked in blanks for selected analysis dates.

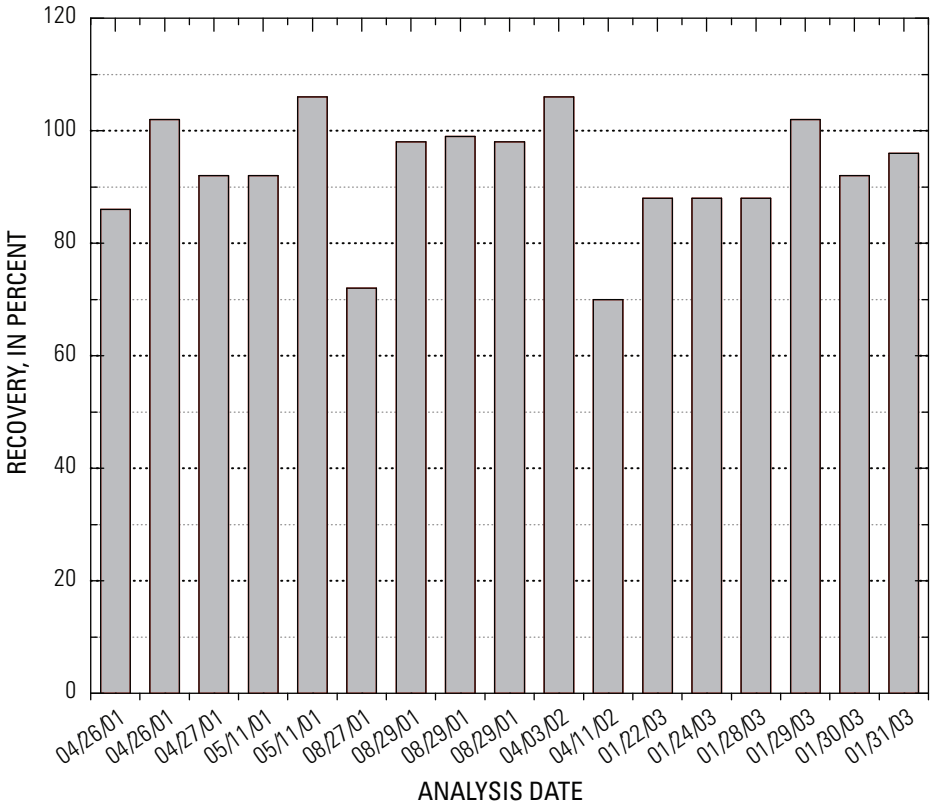

Figure F9. Bar graph plotting recovery (in percent) for mercury (Hg) spiked in blanks for selected analysis dates.

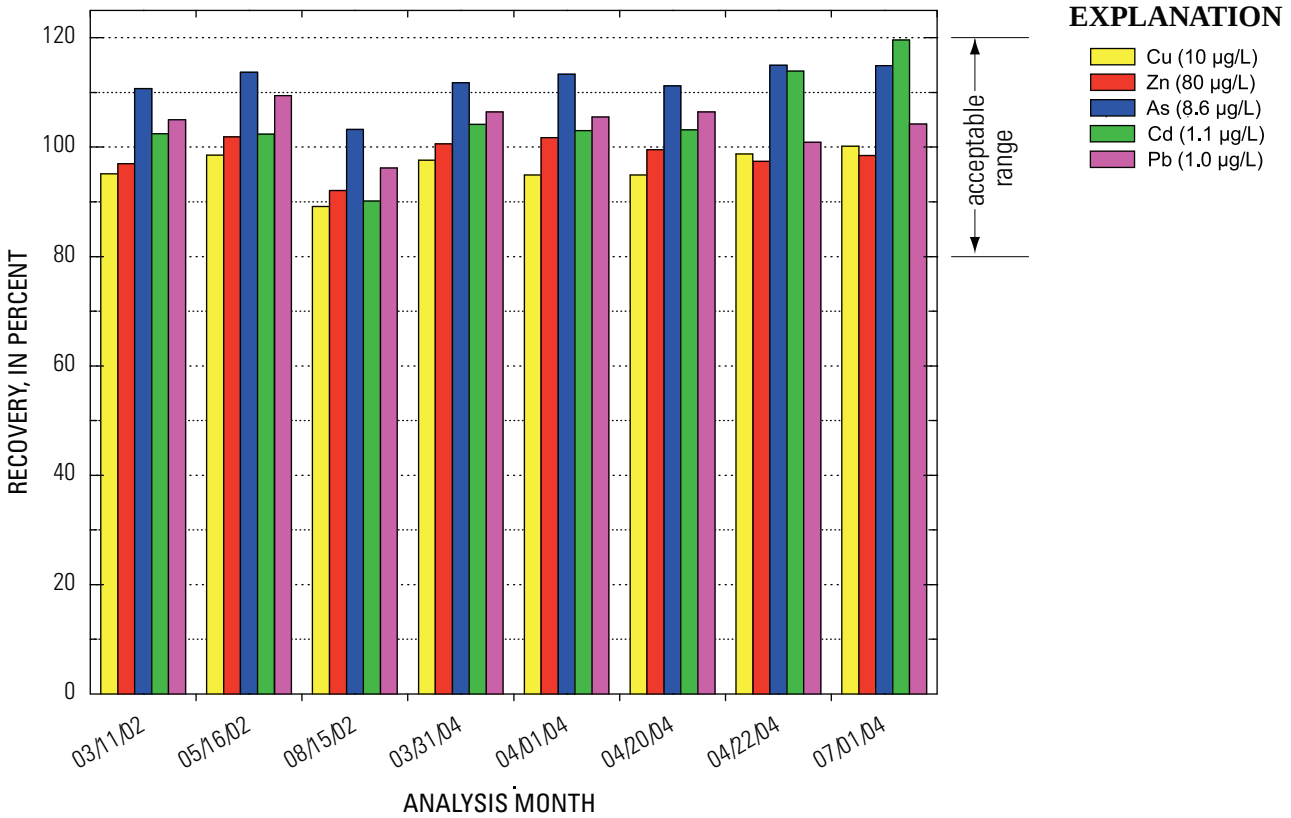

Figure F10. Bar graph plotting recovery (in percent) for beryllium (Be), cadmium (Cd), copper (Cu), and zinc (Zn) spiked in samples for selected analysis dates.

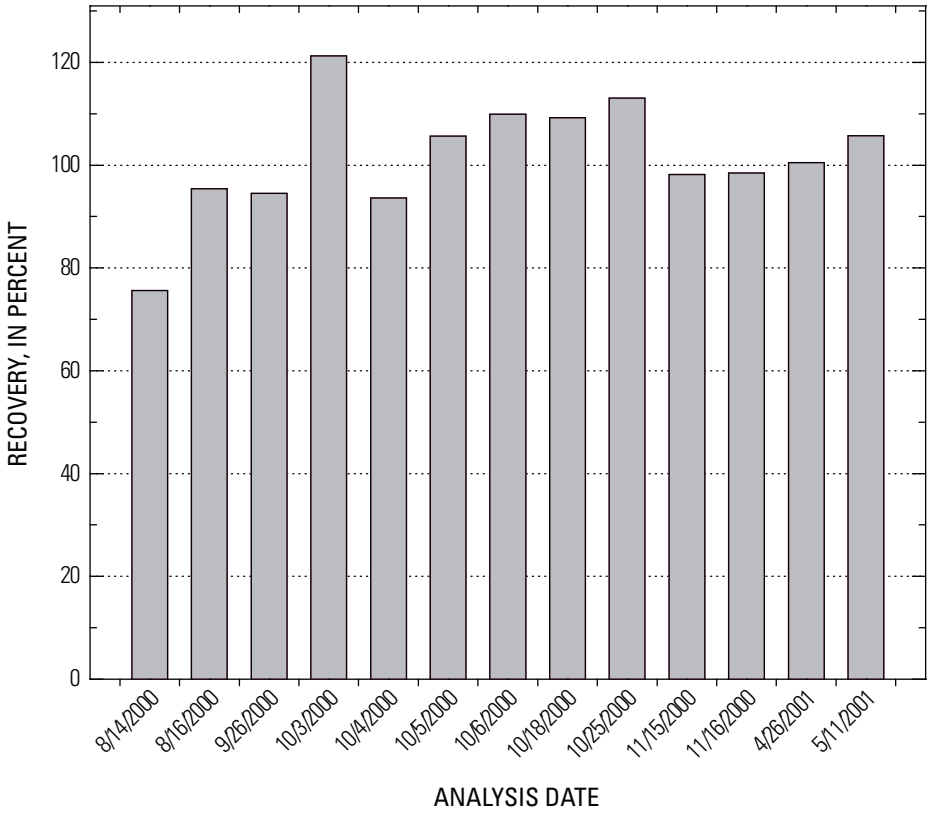

Figure F11. Bar graph plotting recovery (in percent) for mercury spiked in samples for selected analysis dates.

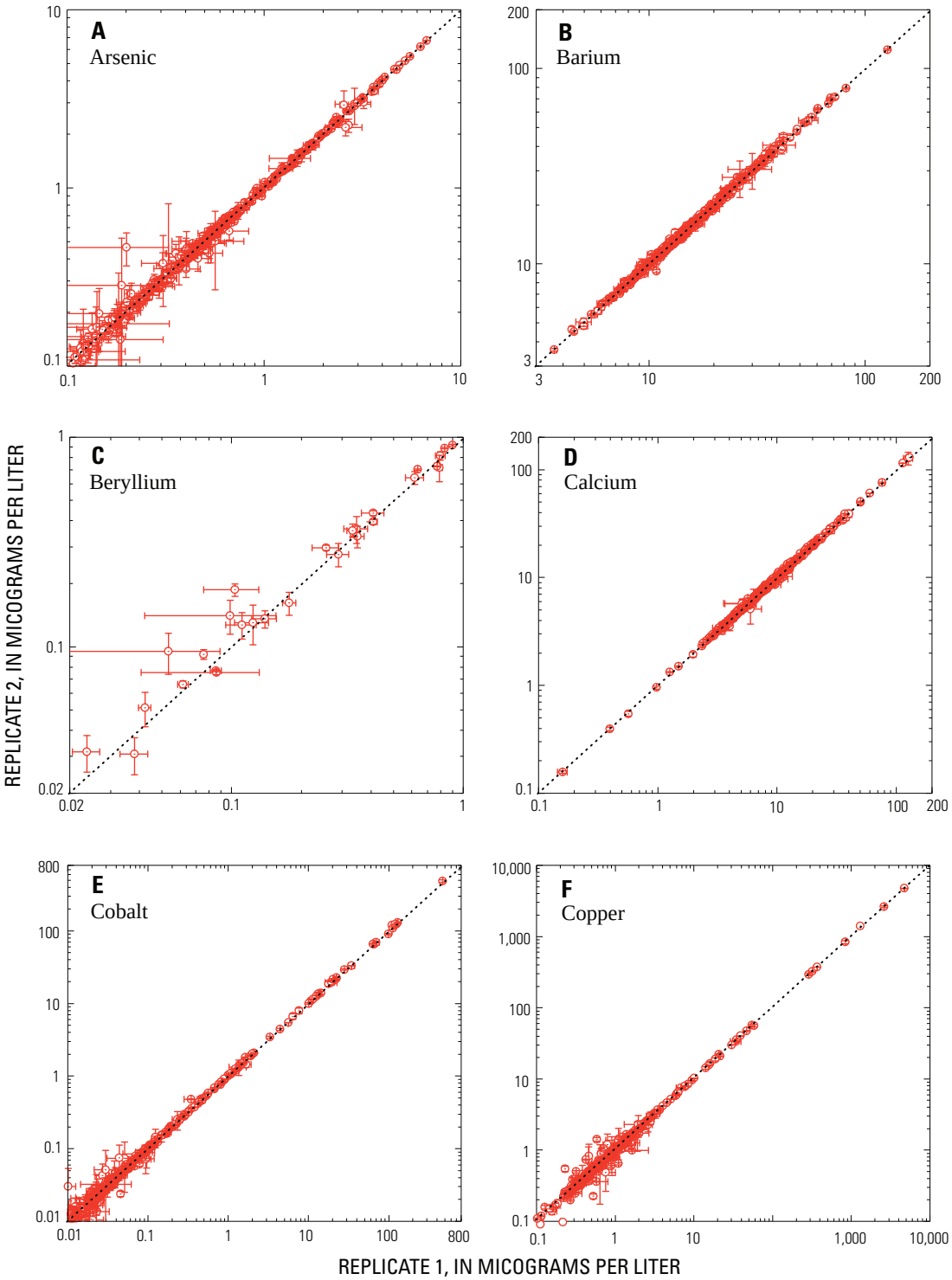

Figure F12. Correlation plots of field duplicate analyses of six elements: (A) arsenic, (B) barium, (C) beryllium, (D) calcium, (E) cobalt, and (F) copper, determined on field duplicate samples. (Each duplicate sample analyzed in triplicate; mean value shown with standard deviation.)

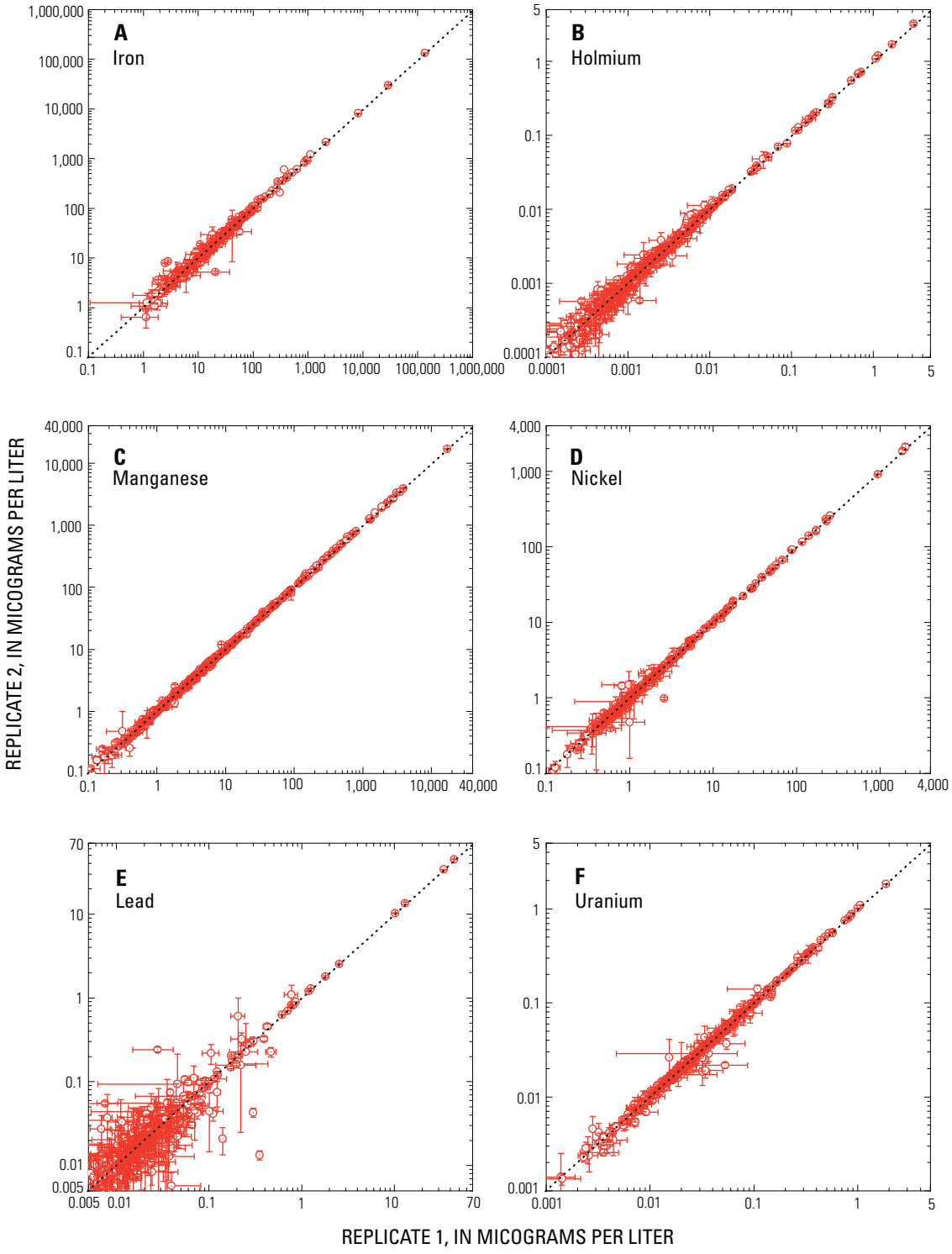

Figure F13. Correlation plots of field duplicate analyses of six elements: (A) iron, (B) holmium, (C) manganese, (D) nickel, (E) lead, and (F) antimony.

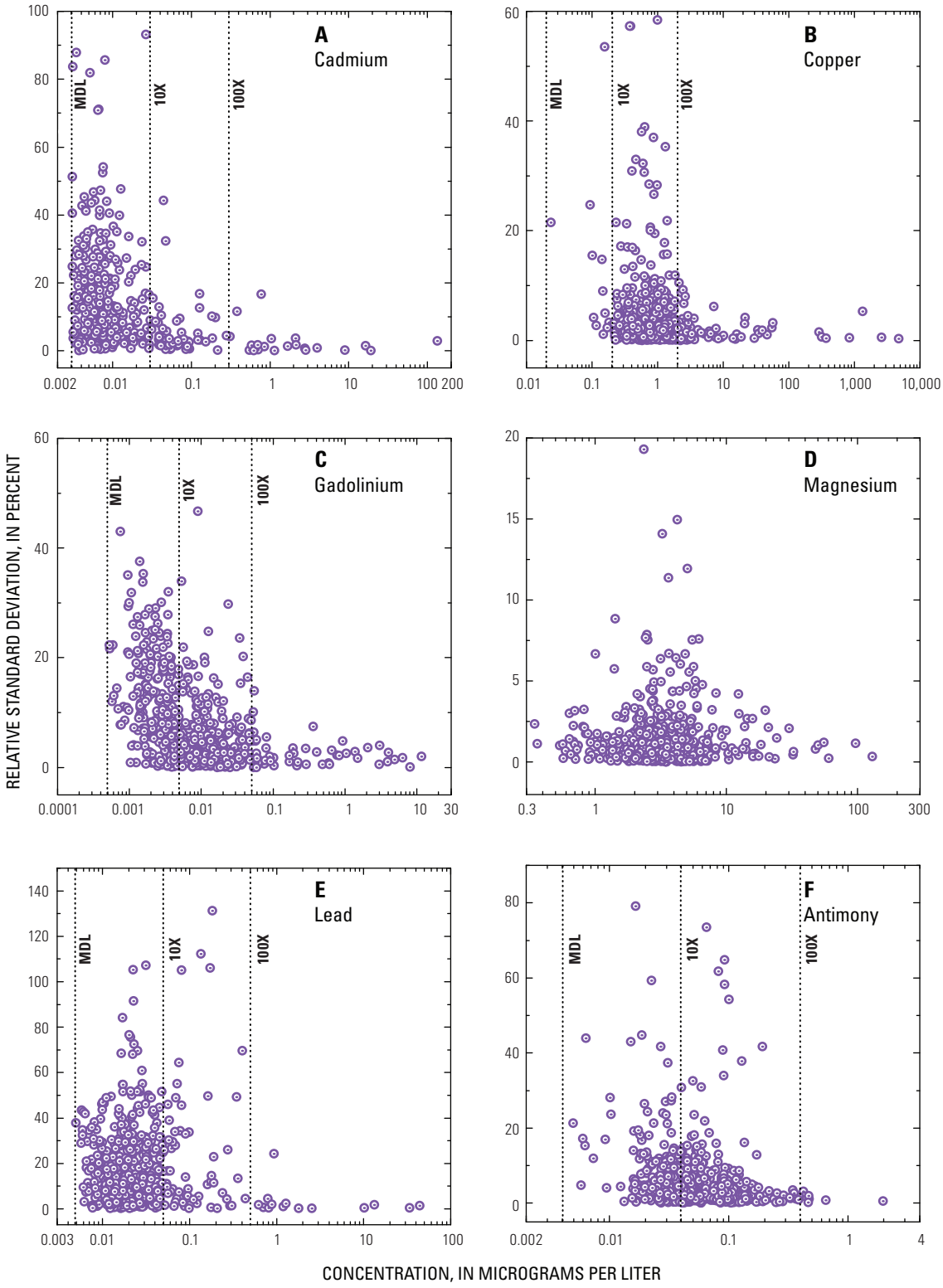

Figure F14. Plots of percent relative standard deviation versus concentration for six elements: (A) cadmium, (B) copper, (C) gadolinium, (D) magnesium, (E) lead, and (F) antimony. MDL, method detection limit; 10X, ten times MDL; 100X, one hundred times MDL.

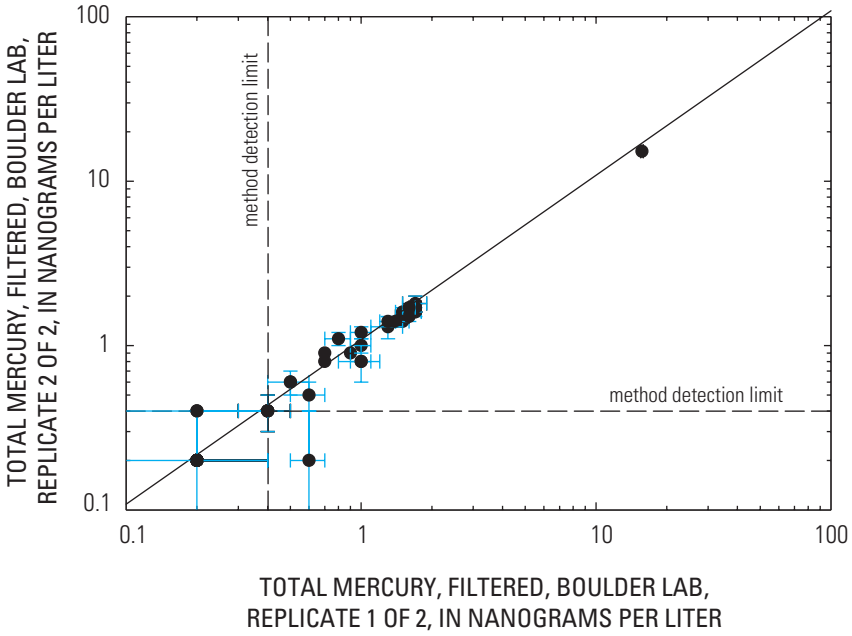

Figure F15. Correlation plot of field duplicates for mercury in filtered water, U.S. Geological Survey laboratory in Boulder, Colorado.

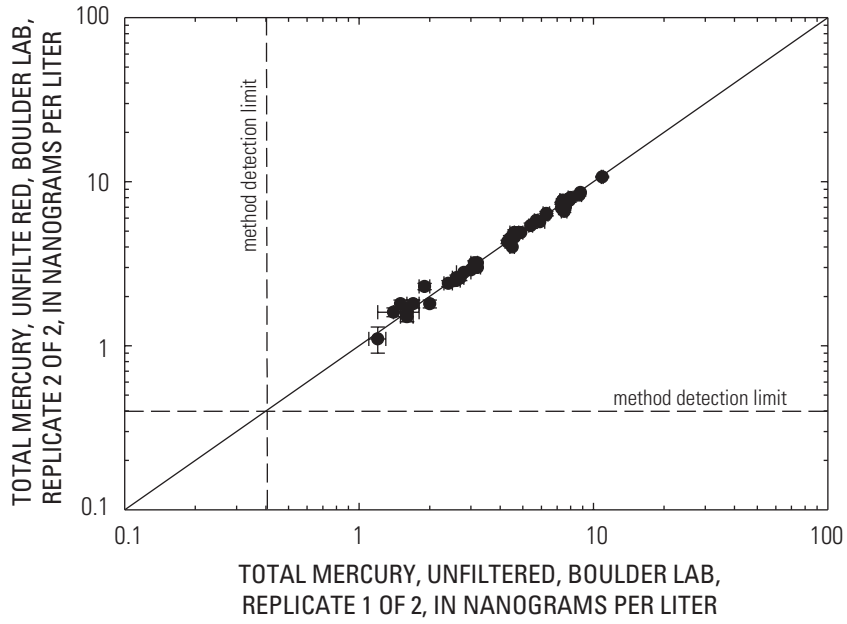

Figure F16. Correlation plot of field duplicates for mercury in unfiltered water, U.S. Geological Survey laboratory in Boulder, Colorado.

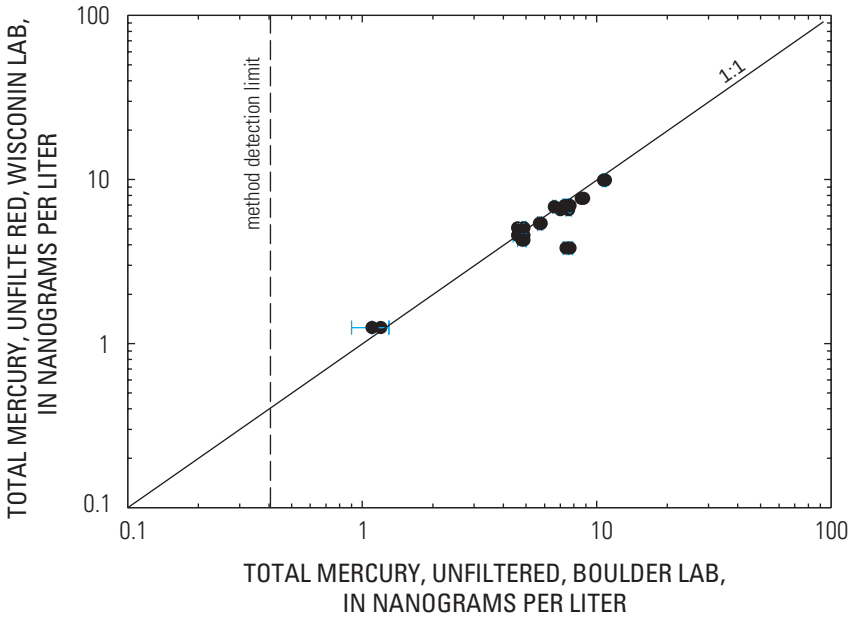

Figure F17. Correlation of laboratory split-sample comparison for mercury in unfiltered water, U.S. Geological laboratories in Boulder, Colorado and Middleton, Wisconsin.

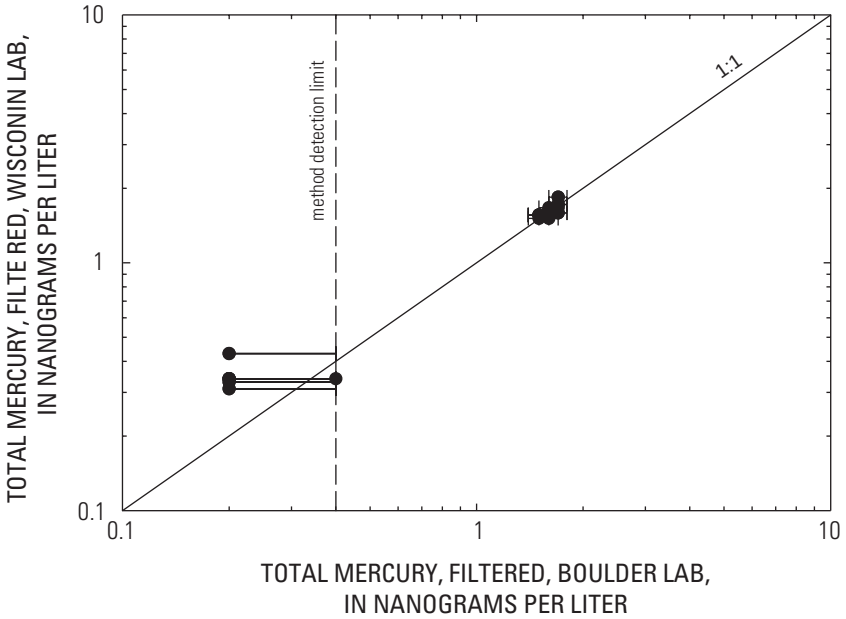

Figure F18. Correlation plot of laboratory split-sample comparison for mercury in filtered water, U.S. Geological Survey laboratories in Boulder, Colorado and Middleton, Wisconsin.

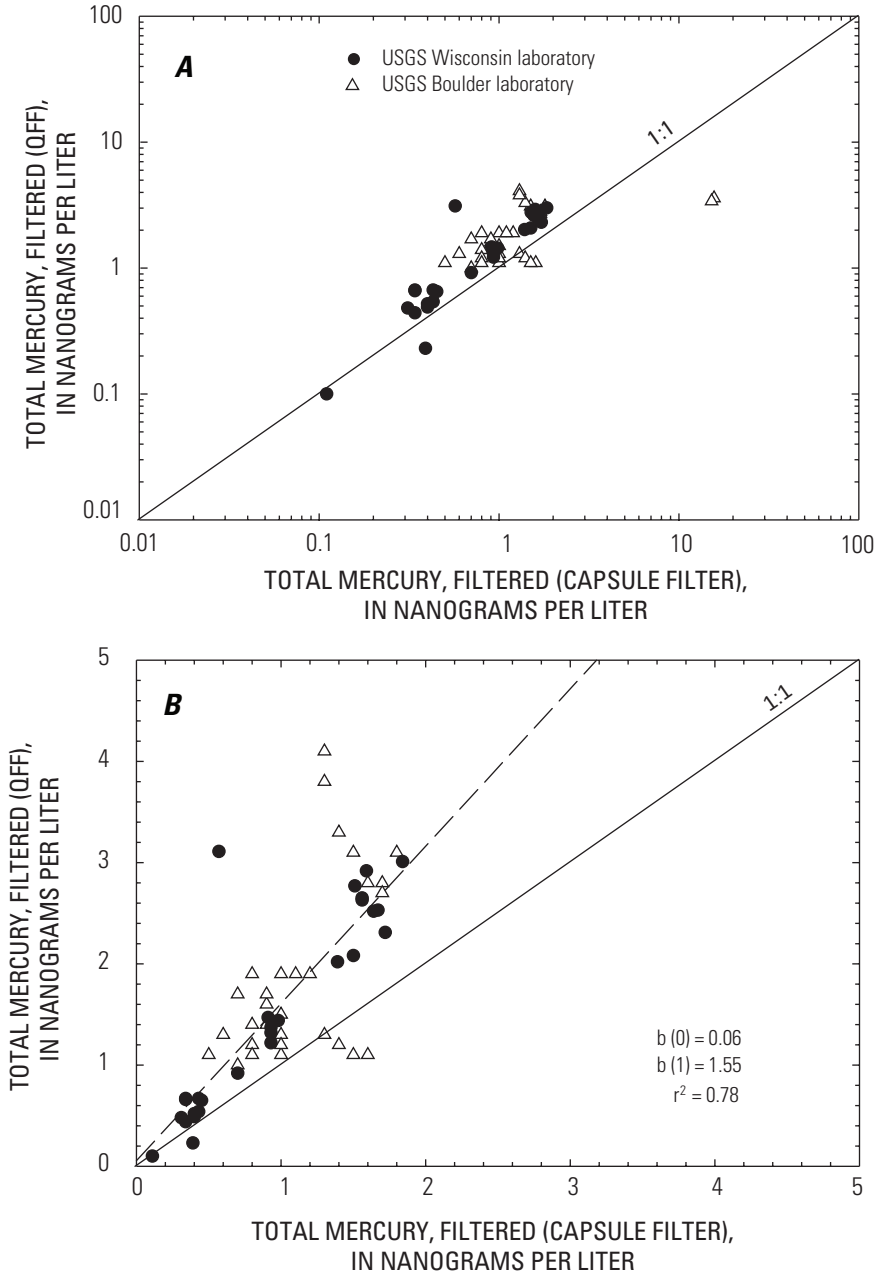

Figure F19. Correlation plot of mercury in filtered water, capsule filter versus quartz fiber filter, (A) Logarithmic scale, (B) Linear scale. Solid circles analyzed by U.S. Geological Survey Wisconsin laboratory. Dashed blue lines represent 95-percent confidence interval associated with linear least-squares regression.

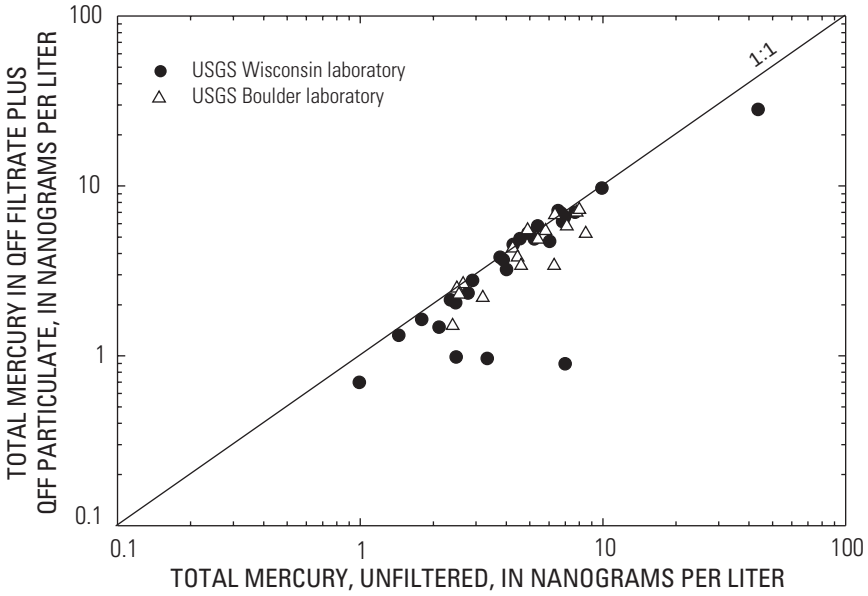

Figure F20. Correlation plot of mercury in unfiltered water and sum of particulate mercury trapped by quartz fiber filter (QFF) and filtered water (passed through QFF). Solid circles analyzed by U.S. Geological Survey Wisconsin laboratory, open triangles analyzed by U.S. Geological Survey Boulder laboratory.

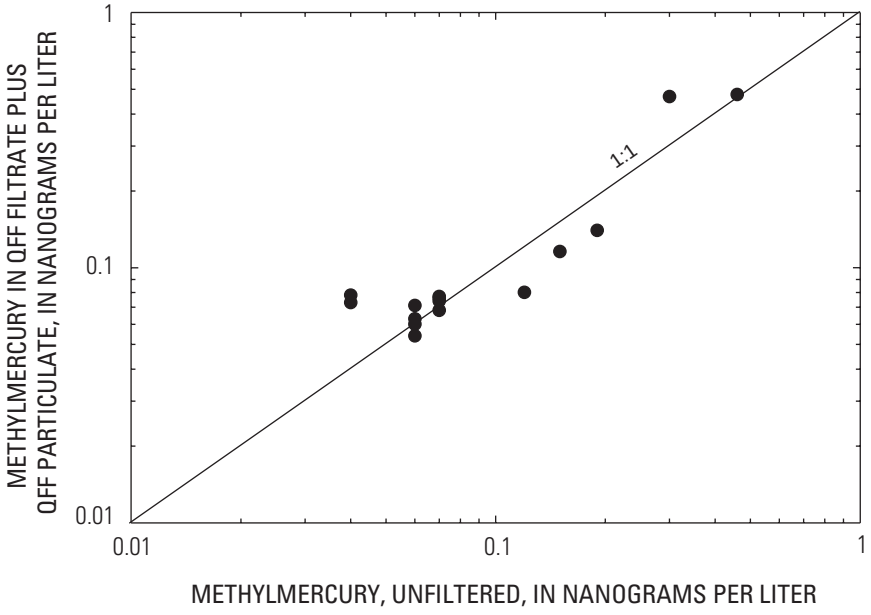

Figure F21. Correlation plot of methylmercury in unfiltered water and sum of particulate mercury trapped by quartz fiber filter (QFF) and filtered water (passed through QFF).

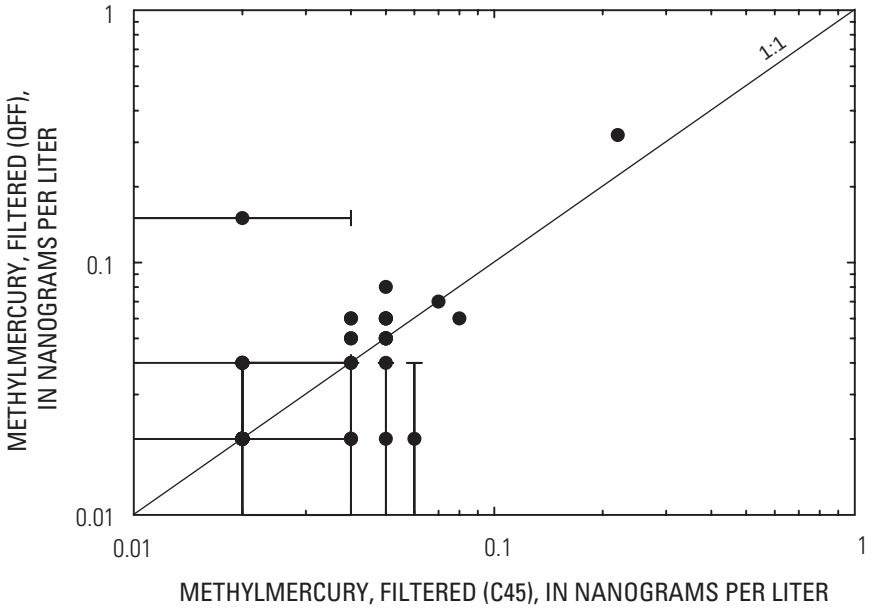

Figure F22. Correlation plot of methylmercury in filtered water, capsule filter versus quartz fiber filter.