

Instructions for Catalog # 500QR Water Pollution Trace Metals

Revision 120823

Description:

- This standard is packaged in a 30 mL screw-top vial containing approximately 28 mL of standard concentrate.
- This concentrate is preserved with approximately 2% (v/v) nitric acid and 0.1% (w/v) tartaric acid.
- The concentrate can be stored at room temperature.
- The diluted standard will contain all the analytes listed in the ranges specified on the data reporting form.

Before you begin:

- The sample resulting from the dilution described below will have a nitric acid concentration of approximately 0.02% before any acid is added. You may add a volume of acid different from the 2 to 5 mL of HNO₃ suggested in order to matrix match your calibration standards or meet any other method criteria.
- If analyzing this standard using colorimetric techniques, it may be necessary to pH adjust the sample prior to analysis. If using colorimetric techniques, it is acceptable to omit the addition of the 2-5 mL nitric acid suggested.
- While it is technically not necessary to digest this standard prior to analysis, digestion should be performed if this is your normal procedure.
- This standard should be analyzed as soon as possible after the concentrate is diluted.

Instructions:

- 1. Add 100-200 mL of deionized water and approximately 2 to 5 mL of nitric acid to a clean 500 mL class A volumetric flask.
- 2. Shake the Trace Metals vial prior to opening.
- 3. Using a clean, dry, class A pipet, volumetrically pipet 10.0 mL of the concentrate into the 500 mL volumetric
- 4. Dilute the flask to final volume (500 mL) with deionized water.
- 5. Cap the flask and mix well.
- 6. Immediately analyze the diluted sample by your normal procedures.
- 7. Report your results as $\mu g/L$ for the diluted sample.

Safety:

ERA products may be hazardous and are intended for use by professional laboratory personnel trained in the competent handling of such materials. Responsibility for the safe use of these products rests entirely with the buyer and/or user. Safety Data Sheets (SDS) for all ERA products are available through our website. www.eraqc.com