



The Micro-COD Test Method
accu-TEST™ Mercury-Free Standard Range (20 – 900 MG/L COD)
or Mercury-Free Low Range (5 – 150 MG/L COD)

- (1) Preheat a COD heater block (do not use oven) to 150° Celsius.
Note: Pretreat samples with chloride greater than 10% of the expected COD (see Technical Bulletin).
 - (2) Remove the cap from a COD twist-cap vial.
 - (3) Carefully add 2.5 mls of sample down the side of the vial such that it forms a layer on top of the reagents.
 - (4) Replace the twist cap.
 - (5) Thoroughly mix the contents of the sealed vial by shaking.
 - (6) Process standards and blanks exactly as the samples.
 - (7) Place the twist-cap vial in a COD heater block for 2 hours.
 - (8) Remove the vial from the heater block and allow to cool.
 - (9) Allow any suspended precipitate to settle and wipe the outside of the vial clean.
 - (10) Use Method A for Standard Range reagent (20 - 900 mg/l COD) or Use Method B for Low Range reagent (5 - 150 mg/l COD)
 - (a) Set the wavelength of the spectrophotometer to 600 nm and using a procedural blank, zero the absorbance reading.
 - (b) Use the **highest standard** (up to 150 mg/l COD) to set the spectrophotometer to zero absorbance at 440 nm.
 - (11) Read the absorbance of each standard and sample on the spectrophotometer.
 - (12) Prepare a graphic calibration curve by plotting the absorbance of the standards versus their known concentrations. * Compare sample absorbances to the graphic calibration curve to determine COD concentrations.
- * Calculation of the linear regression calibration curve via scientific calculator or computer program is preferred.

Also Available From Bioscience, Inc.

- accu-TEST High Range Twist Cap COD Vials (100-4500 mg/l COD)
- accu-TEST Mercury-free Twist-Cap COD Vials
- accu-TEST COD Heater Blocks
- Spectrophotometers/Colorimeters
- Chloride Test Kit
- Ammonia Test Kit