

# Chesapeake Monitoring Cooperative

## Non-tidal Field Data Sheet

Site Name & # \_\_\_\_\_ Stream Name \_\_\_\_\_

Date \_\_\_\_ / \_\_\_\_ / \_\_\_\_ Time (military time) \_\_\_\_\_ Rainfall (mm last 48 hrs) \_\_\_\_\_

Monitors: \_\_\_\_\_

Parameter	Method Used (Circle Applicable)	Calibration Pre / Post Sampling	Measurement 1 <sup>st</sup> / 2 <sup>nd</sup> / 3 <sup>rd</sup> Replicate or Circle observation		
Weather Conditions (cloud cover)			Clear / Partly Cloudy		
Stream Flow			Cloudy / Fog or Haze		
Water Color			Low / Med / High / NA		
			Clear / Milky / Muddy Oil slick / Other		
Air Temperature (°C)	Armored Classic / Digital / Probe	Verified? Y / N			
Water Temperature (°C)	Armored Classic / Digital / Probe	Verified? Y / N			
Dissolved Oxygen (mg/L)	Winkler Titration / Probe				
pH	Kit / Probe / ColorpHast Strips				
Conductivity (µS/cm)	Probe				
TDS (mg/L)	Probe				
Turbidity (JTU)	LaMotte 7519				
Water Clarity (cm)	Secchi Disk / Turbidity Tube				
Alkalinity (mg/L)	Hanna Digital Checker	Pre only:			
Alkalinity (mg/L)	LaMotte 4491-DR-01 / LaMotte 3467-01 LaMotte 4533-DR-01				
Phosphate (mg/L)	Hanna Digital Checker	Pre only:			
Orthophosphate (mg/L)	Hach PO-19 224800 Hanna HI 38061				
Nitrate (mg/L)	Hach NI-14 1416100 / LaMotte 3110 LaMotte 3354				

Comments: \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_

Use this chart to determine if your two replicates are within range of each other. If not, perform a third test.

Parameter	Acceptable Range
Temperature	Armored (+/- 1° C) / Digital (+/- 0.5° C)
Dissolved Oxygen Sodium Thiosulfate Check	Only perform 1 test. If <9.4 or >10 mg/L, do a second test. If both tests are not within 0.4 mg/L of each other, do not measure DO.
Dissolved Oxygen	+/- 0.6 mg/L
pH	+/- 1 pH unit
TDS / Conductivity	± 2% FS
Nitrate	Low range (0–1 mg/L) = +/- 0.1 mg/L Mid range (1–10 mg/L) = +/- 1 mg/L
Phosphate	+/- 0.04 mg/L
Alkalinity	< 100 mg/L = +/- 10 mg/L > 100 mg/L = +/- 20 mg/L
Turbidity	+/- 5 JTU

**E. coli Bacteria Measurement (using Coliscan Easygel plates)**

Incubation time: \_\_\_\_\_ hours (to nearest hour)

Incubation temp: \_\_\_\_\_ o C (to nearest half degree)

Media expiration date: \_\_\_\_\_ Plate expiration date: \_\_\_\_\_

**Amount of water sample added to media bottle (max 5 ml per Rep):**

Rep1: \_\_\_\_\_(A1) Rep2: \_\_\_\_\_(A2)

**Total # of purple or dark blue colonies on plate:** Rep1: \_\_\_\_\_(B1) Rep2: \_\_\_\_\_(B2)

Note: disregard any pink, blue-green or white colonies- these are not E. coli bacteria

**To calculate the Total Colonies of E. coli bacteria per 100 ml of water:**

1. Divide 100 by the ml of water used. 2. Multiply this quotient by the number of purple colonies counted

**Rep1:  $[(100 \div A1) * B1] =$  \_\_\_\_\_(C1)      **Rep2:  $[(100 \div A2) * B2] =$  \_\_\_\_\_(C2)****

**Total Time Spent Monitoring:**(Includes travel to and from monitoring site; equipment preparation; sample collection; water's edge time; and time spent filling out data sheets):

Name: \_\_\_\_\_ Hours: \_\_\_\_\_ (Round to nearest 15 min.)

Name: \_\_\_\_\_ Hours: \_\_\_\_\_ (Round to nearest 15 min.)

Name: \_\_\_\_\_ Hours: \_\_\_\_\_ (Round to nearest 15 min.)

**Lead Monitor Signature:** \_\_\_\_\_ **Date:** \_\_\_\_\_

Once datasheets have been entered in the database, send original forms to your coordinator or:

Alliance for the Chesapeake Bay  
Attn: Chesapeake Monitoring Coop  
612 Hull St. Suite 101C  
Richmond, VA 23225

Or

ALLARM  
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P.O. Box 1773-College & Loucher Streets  
Carlisle , PA 17013