

Central Laboratory Submittal Form

Horse / Elbow
 *D *A
 Customer: CEN-DIST
 Project ID: SMP

Requester: Michael Linger

Field Report Prepared By: Mike Linger

Collected By: Mike Linger, Leif Boman

Sampling Agency: FOEP

CE-ROC

Location	Horse Creek W of US Hwy 1 Bridge	Field ID	27010589 Field ID STORET	Collection (comp begin or grab)	☐ Comp ☒ Grab	Date	11/3/16	Time	11:30	Eastern	Composite end	Bottle Group(s)
Field ID		Matrix (type, e.g., Salt, Fresh, etc)	Salt	Diss. Oxygen	☒ mg/L ☐ % sat	Total Res. Chlorine (mg/L)						A
STOR	Date: 11/3/2016 RQ-2016-11-07-78	Temp (C)	24.8	pH	6.7	Sample Depth	0.3	ft	☐ ft ☒ m	Sp. Conductance (umho/cm)	30,563	
Latitude	☐ dd ☐ dms	Longitude	☐ dd ☐ dms	Salinity (ppt)		Comments						
Location	Elbow Creek @ 540m DS of Apollo	Field ID	G5CE0070 Field ID STORET	Collection (comp begin or grab)	☐ Comp ☒ Grab	Date	11/3/16	Time	12:00	Eastern	Composite end	Bottle Group(s)
Field ID		Matrix (type, e.g., Salt, Fresh, etc)	Fresh	Diss. Oxygen	☒ mg/L ☐ % sat	Total Res. Chlorine (mg/L)						B
STOR	Date: 11/3/2016 RQ-2016-11-07-78	Temp (C)	24.1	pH	6.9	Sample Depth	0.2	ft	☐ ft ☒ m	Sp. Conductance (umho/cm)	701	
Latitude	☐ dd ☐ dms	Longitude	☐ dd ☐ dms	Salinity (ppt)		Comments						
Location		Field ID		Collection (comp begin or grab)	☐ Comp ☐ Grab	Date		Time		Eastern	Composite end	Bottle Group(s)
Field ID		Matrix (type, e.g., Salt, Fresh, etc)		Diss. Oxygen	☐ mg/L ☐ % sat	Total Res. Chlorine (mg/L)						
STOR		Temp (C)		pH		Sample Depth		ft	☐ ft ☐ m	Sp. Conductance (umho/cm)		
Latitude	☐ dd ☐ dms	Longitude	☐ dd ☐ dms	Salinity (ppt)		Comments						
Location		Field ID		Collection (comp begin or grab)	☐ Comp ☐ Grab	Date		Time		Eastern	Composite end	Bottle Group(s)
Field ID		Matrix (type, e.g., Salt, Fresh, etc)		Diss. Oxygen	☐ mg/L ☐ % sat	Total Res. Chlorine (mg/L)						
STOR		Temp (C)		pH		Sample Depth		ft	☐ ft ☐ m	Sp. Conductance (umho/cm)		
Latitude	☐ dd ☐ dms	Longitude	☐ dd ☐ dms	Salinity (ppt)		Comments						

Relinquished By:	Date/Time	Shipping Method	Number of Coolers Shipped:	Received By:	Date/Time
MKL	11/3/16 13:43	FedEx	1	[Signature]	11-4-16/10-00

Printed: 11/3/2016 8:10:40 AM

Page 1 of 2

Date of Request: 03-NOV-2016
 Created By: LINGER_M On: 03-NOV-2016
 Modified By: LINGER_M On: 03-NOV-2016
 Customer: CEN-DIST
 Project: SMP
 Division: Division of Environmental Assessment and Restoration
 District: Central District
 Sampling Event: Horse Creek/Elbow Creek

Send Coolers To:

Phone: 407-897-4180
 FL Dept. of Environmental Protection
 3319 Maguire Blvd., Suite 232
 Orlando, FL 32803-3767
 Attn: Mike Linger

Send Final Report To:

FL Dept. of Environmental Protection
 3319 Maguire Blvd., Suite 232
 Orlando, FL 32803-3767
 Attn: Mike Linger

Program Module Number: 1306
 Priority: 3
 Event Status: P
 Criminal Investigation: NO
 Chemistry Request Reviewed By:
 Biology Request Reviewed By:
 Sampling Kit Required: NO Ship on:
 Sampling Kit Shipped:
 Sampling Kit Packed By:
 Preservatives Needed: NO
 Date to Receive Samples: 07-NOV-2016
 Received By:

Report Type: Final Only
 FTP Data: NO
 QC Report: YES
 Date Log: NO
 Authorization Log: NO

Comments:

Bottle Group A (Water) With 1 Samples:

Bottle Type: P-1L	Number of Bottles: 1	Preserved With: ICE	sent: <u>1</u>
ALKALINITY	Template: DEFAULT	(SM 2320 B-97) Alkalinity in aqueous matrices as mg CaCO3/L	
Total Alkalinity			
TURBIDITY	Template: DEFAULT	(EPA 180.1 Rev. 2.0) Turbidity in aqueous matrices	
Turbidity			
W-F	Template: DEFAULT	(SM 4500 F-C-97) Fluoride in aqueous matrices, without distillation (not valid for NPDES monitoring)	
Fluoride			
W-TSS	Template: DEFAULT	(SM 2540 D-97) Total Suspended Solids in aqueous matrices	
TSS			
Bottle Type: BP-1L	Number of Bottles: 1	Preserved With: ICE	sent: <u>1</u>
CHLSUITE-W	Template: DEFAULT	(SM 10200 H (mod.)) Phytoplankton chlorophyll-a corrected, uncorrected, phaeophytin and ratio by spectrophotometry	
Chlorophyll/Phaeophytin Ratio			
Chlorophyll-a, Corrected			
Chlorophyll-a, Uncorrected			
Phaeophytin-a			
Bottle Type: P-500ML	Number of Bottles: 1	Preserved With: HNO3	sent: <u>1</u>
W-ICP	Template:	(EPA 200.7 Rev. 4.4) Total Recoverable Metals analysis using ICP emission spectroscopy for aqueous samples supporting Clean Water Act Projects	
Chromium			
Iron			
Zinc			
W-ICPMS	Template: PRTY	(EPA 200.8 Rev. 5.4) Total Recoverable Metals analysis using ICP-MS for aqueous samples supporting Clean Water Act Projects	
Arsenic			
Cadmium			
Copper			

Bottle Group A (Water) With 1 Samples:

Bottle Type: P-500ML Number of Bottles: 1 Preserved With: HNO3
 W-ICPMS Template: PRTY (EPA 200.8 Rev. 5.4) Total Recoverable Metals analysis using ICP-MS for aqueous samples supporting Clean Water Act Projects

Lead
 Nickel
 Silver

Bottle Type: P-500ML Number of Bottles: 1 Preserved With: ICE And H2SO4
 W-NH3 Template: DEFAULT (EPA 350.1 Rev. 2.0) Ammonia in aqueous matrices as mg N/L
 Ammonia-N
 W-NO2NO3 Template: DEFAULT (EPA 353.2 Rev. 2.0) Nitrite/Nitrate in aqueous matrices as mg N/L
 NO2NO3-N
 W-S-A-TP Template: DEFAULT (EPA 365.1 Rev. 2.0) Total Phosphorus in aqueous matrices as mg P/L
 Total-P
 W-TKN Template: DEFAULT (EPA 351.2 Rev. 2.0) Total Kjeldahl Nitrogen in aqueous matrices
 Kjeldahl Nitrogen
 W-TOC Template: DEFAULT (SM 5310 B-00) Nonpurgeable Organic Carbon in aqueous matrices
 Organic Carbon

sent: 1

Bottle Type: P-125ML Number of Bottles: 1 Preserved With: ICE-FLTR
 W-PO4-F Template: DEFAULT (EPA 365.1 Rev. 2.0) Ortho-phosphate, dissolved, in filtered, aqueous matrices as mg P/L
 O-Phosphate-P

sent: 1**Bottle Group B (Water) With 1 Samples:**

Bottle Type: P-1L Number of Bottles: 1 Preserved With: ICE
 ALKALINITY Template: DEFAULT (SM 2320 B-97) Alkalinity in aqueous matrices as mg CaCO3/L
 Total Alkalinity
 TURBIDITY Template: DEFAULT (EPA 180.1 Rev. 2.0) Turbidity in aqueous matrices
 Turbidity
 W-CL-IC Template: DEFAULT (EPA 300.0 Rev. 2.1) Chloride in aqueous matrices
 Chloride
 W-COLOR Template: DEFAULT (SM 2120 B) True Color measured at 450 nm
 Color (true)
 W-F Template: DEFAULT (SM 4500 F-C-97) Fluoride in aqueous matrices, without distillation (not valid for NPDES monitoring)

sent: 1

Fluoride
 W-SO4-IC Template: DEFAULT (EPA 300.0 Rev. 2.1) Sulfate in aqueous matrices
 Sulfate
 W-TDS Template: DEFAULT (SM 2540 C-97) Total Dissolved Solids in aqueous matrices
 TDS
 W-TSS Template: DEFAULT (SM 2540 D-97) Total Suspended Solids in aqueous matrices
 TSS

Bottle Type: BP-1L Number of Bottles: 1 Preserved With: ICE
 CHLSUITE-W Template: DEFAULT (SM 10200 H (mod.)) Phytoplankton chlorophyll-a corrected, uncorrected, phaeophytin and ratio by spectrophotometry

sent: 1

Chlorophyll/Phaeophytin Ratio
 Chlorophyll-a, Corrected
 Chlorophyll-a, Uncorrected
 Phaeophytin-a

Bottle Type: P-500ML Number of Bottles: 1 Preserved With: ICE And H2SO4
 W-NH3 Template: DEFAULT (EPA 350.1 Rev. 2.0) Ammonia in aqueous matrices as mg N/L
 Ammonia-N
 W-NO2NO3 Template: DEFAULT (EPA 353.2 Rev. 2.0) Nitrite/Nitrate in aqueous matrices as mg N/L
 NO2NO3-N
 W-S-A-TP Template: DEFAULT (EPA 365.1 Rev. 2.0) Total Phosphorus in aqueous matrices as mg P/L
 Total-P
 W-TKN Template: DEFAULT (EPA 351.2 Rev. 2.0) Total Kjeldahl Nitrogen in aqueous matrices
 Kjeldahl Nitrogen
 W-TOC Template: DEFAULT (SM 5310 B-00) Nonpurgeable Organic Carbon in aqueous matrices
 Organic Carbon

sent: 1

Bottle Type: P-125ML Number of Bottles: 1 Preserved With: ICE-FLTR
 W-PO4-F Template: DEFAULT (EPA 365.1 Rev. 2.0) Ortho-phosphate, dissolved, in filtered, aqueous matrices as mg P/L
 O-Phosphate-P

sent: 1

Date of Request: 03-NOV-2016
 Created By: LINGER_M On: 03-NOV-2016
 Modified By: WATTS_J On: 04-NOV-2016
 Customer: CEN-DIST
 Project: SMP
 Division: Division of Environmental Assessment and Restoration
 District: Central District
 Sampling Event: Horse Creek/Elbow Creek

Send Coolers To:

Phone: 407-897-4180
 FL Dept. of Environmental Protection
 3319 Maguire Blvd., Suite 232
 Orlando, FL 32803-3767
 Attn: Mike Linger

Program Module Number: 1306
 Priority: 3
 Event Status: R
 Criminal Investigation: NO
 Chemistry Request Reviewed By: WATTS_J On: 04-NOV-2016
 Biology Request Reviewed By: WATTS_J On: 04-NOV-2016
 Sampling Kit Required: NO Ship on:
 Sampling Kit Shipped:
 Sampling Kit Packed By:
 Preservatives Needed: NO
 Date to Receive Samples: 07-NOV-2016
 Received By: SHAIK_A On: 04-NOV-2016

Send Final Report To:

FL Dept. of Environmental Protection
 3319 Maguire Blvd., Suite 232
 Orlando, FL 32803-3767
 Attn: Mike Linger

Report Type: Final Only
 FTP Data: NO
 QC Report: YES
 Date Log: NO
 Authorization Log: NO

Comments:

Bottle Group A (Water) With 1 Samples:

Bottle Type: P-1L	Number of Bottles: 1	Preserved With: ICE
ALKALINITY	Template: DEFAULT	(SM 2320 B-97) Alkalinity in aqueous matrices as mg CaCO ₃ /L
TURBIDITY	Template: DEFAULT	(EPA 180.1 Rev. 2.0) Turbidity in aqueous matrices
W-F	Template: DEFAULT	(SM 4500 F-C-97) Fluoride in aqueous matrices, without distillation (not valid for NPDES monitoring)
W-TSS	Template: DEFAULT	(SM 2540 D-97) Total Suspended Solids in aqueous matrices
Bottle Type: BP-1L	Number of Bottles: 1	Preserved With: ICE
CHLSUITE-W	Template: DEFAULT	(SM 10200 H (mod.)) Phytoplankton chlorophyll-a corrected, uncorrected, phaeophytin and ratio by spectrophotometry
Bottle Type: P-500ML	Number of Bottles: 1	Preserved With: HNO ₃
W-ICP	Template:	(EPA 200.7 Rev. 4.4) Total Recoverable Metals analysis using ICP emission spectroscopy for aqueous samples supporting Clean Water Act Projects
Chromium		
Iron		
Zinc		
W-ICPMS	Template: PRTY	(EPA 200.8 Rev. 5.4) Total Recoverable Metals analysis using ICP-MS for aqueous samples supporting Clean Water Act Projects
Arsenic		
Cadmium		
Copper		
Lead		
Nickel		
Silver		
Bottle Type: P-500ML	Number of Bottles: 1	Preserved With: ICE And H ₂ SO ₄
W-NH ₃	Template: DEFAULT	(EPA 350.1 Rev. 2.0) Ammonia in aqueous matrices as mg N/L
W-NO ₂ NO ₃	Template: DEFAULT	(EPA 353.2 Rev. 2.0) Nitrite/Nitrate in aqueous matrices as mg N/L
W-S-A-TP	Template: DEFAULT	(EPA 365.1 Rev. 2.0) Total Phosphorus in aqueous matrices as mg P/L
W-TKN	Template: DEFAULT	(EPA 351.2 Rev. 2.0) Total Kjeldahl Nitrogen in aqueous matrices

Bottle Group A (Water) With 1 Samples:

Bottle Type: P-500ML	Number of Bottles: 1	Preserved With: ICE And H2SO4
W-TOC	Template: DEFAULT	(SM 5310 B-00) Nonpurgeable Organic Carbon in aqueous matrices
Bottle Type: P-125ML	Number of Bottles: 1	Preserved With: ICE-FLTR
W-PO4-F	Template: DEFAULT	(EPA 365.1 Rev. 2.0) Ortho-phosphate, dissolved, in filtered, aqueous matrices as mg P/L

Bottle Group B (Water) With 1 Samples:

Bottle Type: P-1L	Number of Bottles: 1	Preserved With: ICE
ALKALINITY	Template: DEFAULT	(SM 2320 B-97) Alkalinity in aqueous matrices as mg CaCO3/L
TURBIDITY	Template: DEFAULT	(EPA 180.1 Rev. 2.0) Turbidity in aqueous matrices
W-CL-IC	Template: DEFAULT	(EPA 300.0 Rev. 2.1) Chloride in aqueous matrices
W-COLOR	Template: DEFAULT	(SM 2120 B) True Color measured at 450 nm
Color (true)		
W-F	Template: DEFAULT	(SM 4500 F-C-97) Fluoride in aqueous matrices, without distillation (not valid for NPDES monitoring)
W-SO4-IC	Template: DEFAULT	(EPA 300.0 Rev. 2.1) Sulfate in aqueous matrices
W-TDS	Template: DEFAULT	(SM 2540 C-97) Total Dissolved Solids in aqueous matrices
W-TSS	Template: DEFAULT	(SM 2540 D-97) Total Suspended Solids in aqueous matrices
Bottle Type: BP-1L	Number of Bottles: 1	Preserved With: ICE
CHLSUITE-W	Template: DEFAULT	(SM 10200 H (mod.)) Phytoplankton chlorophyll-a corrected, uncorrected, phaeophytin and ratio by spectrophotometry
Bottle Type: P-500ML	Number of Bottles: 1	Preserved With: ICE And H2SO4
W-NH3	Template: DEFAULT	(EPA 350.1 Rev. 2.0) Ammonia in aqueous matrices as mg N/L
W-NO2NO3	Template: DEFAULT	(EPA 353.2 Rev. 2.0) Nitrite/Nitrate in aqueous matrices as mg N/L
W-S-A-TP	Template: DEFAULT	(EPA 365.1 Rev. 2.0) Total Phosphorus in aqueous matrices as mg P/L
W-TKN	Template: DEFAULT	(EPA 351.2 Rev. 2.0) Total Kjeldahl Nitrogen in aqueous matrices
W-TOC	Template: DEFAULT	(SM 5310 B-00) Nonpurgeable Organic Carbon in aqueous matrices
Bottle Type: P-125ML	Number of Bottles: 1	Preserved With: ICE-FLTR
W-PO4-F	Template: DEFAULT	(EPA 365.1 Rev. 2.0) Ortho-phosphate, dissolved, in filtered, aqueous matrices as mg P/L

Log-in Checklist

RQ- 2016-11-07-78

Shipping Method: Fed Exp

Date/Time of Receipt: 11-4-16 10:00

Cooler ID	Cooler Temperature*	No. Sample Containers in Cooler	Evidence Tape				Tracking # (fill out only if waybill copy is damaged)
			Present?		*Intact?		
			Yes	No	Yes	No	
Red	2.1C	9		✓			8100 1918 7151

*If the temperature of a cooler is above 6.0 °C (or above 10.0 °C for W-1-4-DIOX), or if Evidence Seal is damaged, identify the containers in the affected cooler(s) on back of this form.

****Note:** If "No" is checked in any of the fields below, fill out the back of this form with additional details (Field ID, Test IDs, etc.) and generate an NCR.

**Chain of Custody/ Field Sheet(s) Included? Yes ☒ No ☐

CONTAINER CHECK

**Evidence Tape on Bottles? Yes ☐ No ☒ If yes, is it intact? Yes ☐ No ☐

**Caps on tight? Yes ☒ No ☐ **Containers intact? Yes ☒ No ☐

**Sufficient Sample Volume: Yes ☐ No ☐

CHLORINE CHECK (Blue dot on container)

Check the Box marked "Yes" or "No" for the Presence of Chlorine. If Cl detected, an NCR is required.					
Analysis	Yes	No	Analysis	Yes	No
W-1,4 DIOX			W-PC-AA-SF		
W-AHERB-AA (-AHB-AA-R)			W-PCL-SQ (-R)		
W-BNA (-625, -R)			W-PDQUAT		
W-CARB-AA (-CAB-AA-R)			W-PESTNP-R		
W-ENDO-AA			W-PSCL-TQ		
W-GLYPH			W-PSNP-TQ		
W-NP-AA-SF			W-PST-CL-R		
W-PAH (-R)			W-TR-TQ		
W-PCB-R					

PRESERVATION CHECK (EXCLUDING SAMPLES SENT TO OVERFLOW LABS, "OV-")

**Acid Preserved Samples: pH ≤ 2.0? Yes ☒ No ☐ NA ☐ Init: ABJ

**W-1-4-DIOX (Green dot on container) preserved to pH < 4.0? Yes ☐ No ☐ NA ☐ Init: -

Coolers Unpacked/Checked by: ABJ Date: 11-4-16

NCRs (Y/N)? -

Event ID: Horse Creek/Elbow Creek
CEN-DIST-2016-11-04-02 (SMP)
 Date Received: 04-NOV-2016 10:00

NCR #

Log-in Checklist

Samples with Incorrect pH Preservation or presence of Chlorine

Field ID	Bottle Test ID(s)	pH / Cl	Action Taken

Samples in Coolers with Incorrect Preservation or Damaged Evidence Tape

Cooler ID	Field ID	Bottle Test ID(s)

Bottles Not Intact

Field ID	Bottle Test ID(s)	Loose Cap	Damaged Cap		Damaged Container		Evidence Tape Not Intact
			CK	BR	CK	BR	

Samples with Insufficient Volume for Analyses

Field ID	Bottle Test ID(s)	Action Taken

ENCORE SAMPLES

S-VOC-MS samples in Encores must be frozen within 48 hours of collection.

Were Encore samples received? Yes_____ No_____

Date and time placed in freezer _____

Were all samples placed in freezer within 48 hours of collection? Yes_____ No_____

If no, were samples shipped on dry ice? Yes_____ No_____

FOR CLEAN LAB USE ONLY – Total Mercury Preservation Check (W-HG-AF; W-HG-AF-F):

Samples preserved within 48 hours? Yes_____ No_____

Date and time samples preserved: _____

Additional Comments: