



FLORIDA DEPARTMENT OF ENVIRONMENTAL PROTECTION STRATEGIC MONITORING PROGRAM FIELD SHEET

January 2019

Data Qualified?

Yes / No

WIN Station Name: Big Branch Downstream of Road 5

Date: 03/19/19
(mm/dd/yyyy)

WIN/ Field ID: G2WA0010 ✓

WBID: 1154

Latitude: 30.158

(Decimal Degrees)

County: Gulf

ORG ID: 21FLWQA

Longitude: -85.252

(Decimal Degrees)

Receiving Body of Water: Stone Mill Creek

RQ- 2018-10-08-27

Sampling Team Members		WQ Measurements	Sample Collection	Documentation	Preservation	Preservation Check	Sampling Equipment					
<u>Blake Spencer</u> <u>Amel Wood-Morath</u>		☒	☒	☒	☒	☒	☒ Sample Container	☐ Van Dorn	☐ Pole			
							☐ Carboy	☒ Syringe				
							☐ Dipper	☐ Other				
							Depth Measured with <u>water stick</u>					
							Equipment ID			Collection Method		
							☒ Wading	☐ Canoe/Kayak				
							☐ From Shore	☐ Electric Motor				
							☐ Other	☐ Gasoline Motor				
Water Level: Dry/ Pooled/ Low / Normal / <u>High</u> / Flooded							Meter ID# <u>Biology #2</u>			Matrix: <u>fresh</u> / Marine / DI		
Photos: Yes / <u>NO</u>		Flow: No Flow / Intestinal / <u>Flowing</u> / NA		Tide: Rising/ Falling/ Slack/ <u>NA</u>		Tide Times: High — Low —						
Time Zone	Time	Total Depth (m)	Sample Depth (m)	Secchi Disk (m)	DO (mg/L)	DO (%SAT)	pH	Salinity (PPT)	Sp COND (µmhos/cm)	Temp. (C°)		
EST	<u>1030</u>	<u>0.3</u>	<u>0.15</u>	<u>VOB</u>	<u>6.01</u>	<u>58.1</u>	<u>4.21</u>	<u>0.01</u>	<u>28</u>	<u>13.84</u>		
CEN												
Biological Samples Collected: None <u>HA</u> <u>SCI</u> <u>RPS</u> Algae ID <u>LVS<2m<LVI</u> Other:												
SBIO ID Numbers: SBIO-ID: <u>79279</u> HA-ID: <u>15696</u> RPS-ID: <u>9270</u> Macrophyte-ID: <u><2m2</u> LIMS#: <u>2071233</u>												
Parameter Suite	Parameter Methods					Preservation	Lot#	Expiration	pH Check			
Preserved Nutrients	☒ W-NH3 / W-NO2NO3 / W-TKN / W-TOC / W-S-A-TP					☒ Ice ☒ H2SO4	<u>SA-8274050</u>	<u>10/01/19</u>	☒ <2			
Metals	☒ W-ICPMS ☒ W-ICP					☒ Ice ☒ HNO3	<u>NA-8080070</u>	<u>3/21/19</u>	☒ <2			
Filtered Nutrients	☒ W-PO4-F ☒ Field Filtered 0.45 µm Filter					☒ Ice	<u>10827054</u>					
Chlorophyll	☒ CHLSUITE-W					☒ Ice						
Physical/Aggregate (Fresh)	☒ Alkalinity / W-F / W-TSS / TURBIDITY / W-CL-IC / W-COLOR / W-SO4-IC / W-TDS					☒ Ice						
Physical/Aggregate (Marine)	☐ Alkalinity / W-BR-IC / W-F / W-TSS / TURBIDITY					☐ Ice						
Macroinvertebrates	☒ MI-FW-QLDC					☒ Formalin						
Periphyton	☐ ALGAE-ID					☐ Ice						
Microbiology	☒ E Coli ☐ F Coli ☐ Enterococci					☒ Ice						
Molecular	☐ PCR-FILTER ☐ PCR-BacR ☐ PCR-GULL2 ☐ PCR-HF183 ☐ PCR-DG3 ☐ PCR-GFD					☐ Ice						
Tracers	☒ W-E8321-DI ☒ W-E8321-MS					☒ Ice						
Pesticides	☒ W-PSNP-TQ ☐ W-CT-CL-R ☒ W-E8321-DI ☐ W-PCL-SQ-R ☒ WE8321-MS ☐ W-CARB-AA					☒ Ice						
Phytoplankton	☐ DTY-QN-C ☐ PKD-QN-C					☐ Ice						
Notes: SCI, RPS, LVS, HA SCI Kit												
Signature: <u>[Signature]</u>							Date: <u>3/19/19</u>					
LIMS EVENT ID: <u>WAS-SECT-2019-03-19-01</u>							WIN Import ID: _____					
Enter Field Parameters, Verify Station ID in LIMS DMT: <u>3/26/19</u>							QC Station ID, Field Parameters in LIMS DMT: <u>AWM 4/4/19</u>					
Scan/Save Field Sheets _____							Verify Data in WIN: _____					
(Initials/Date)							(Initials/Date)					

Big Branch
Downstream
of Road 5

WIN ID / Field ID

G2WA0010

DEP Form FD 9000-3 Physical/Chemical Characterization Field Sheet

SAMPLE ID 79279 ORG ID 21FLWQA ✓ LATITUDE 30.158
 COUNTY GVIF STORET # G2WAOO10 ✓ LONGITUDE -85.252
 DATE 3/19/19 ✓ TIME 1030 SAMPLING AGENCY _____
 SITE NAME Big Branch Downstream Rd. 5
 FIELD ID/NAME G2WAOO10 RECEIVING BODY OF WATER Stone Mill Creek

RIPARIAN ZONE / STREAM FEATURES

PREDOMINANT LAND-USE IN WATERSHED (specify relative percent in each category): Forest/Natural <u>26%</u> Silviculture <u>71%</u> Field/Pasture <u>0.7%</u> Agricultural <u>0%</u> Residential <u>0%</u> Commercial <u>0.2%</u> Industry <u>2%</u> Other (Specify) <u>0%</u>								Landscape Development Intensity Index (LDI) <u>1.52</u>
Local Watershed Erosion (select one): ☒ None ☐ Slight ☐ Moderate ☐ Heavy Local Watershed NPS Pollution: ☒ No evidence ☐ Slight ☐ Moderate ☐ Heavy								Typical Width (m) Depth (m)/Velocity (m/sec) Transect <u>3</u> m wide <u>0.33</u> m/s <u>0.5</u> m deep
Width of Riparian Vegetation (m) on Each Buffer Side Left Bank: <u>12m</u> Right Bank: <u>12m</u>				Hydrologic Modification Score (per FT 3101) <u>3-4</u>				
High Water Mark: <u>0.5</u> + <u>0.3</u> = <u>0.8</u> (m) (above present water level) (present depth) (above bed)				Artificially Impounded ☐ Yes ☒ No				
Artificially ☒ No ☐ Mostly recovered, more sinuous Channelized: ☐ Some recovery ☐ Recent, severe				Canopy Cover % ☐ Open ☐ Lightly Shaded (11-45%) ☐ Heavily Shaded ☒ Moderate Shaded (46-80%)				

SEDIMENT / SUBSTRATE

Sediment Oils ☒ Absent ☐ Slight ☐ Moderate ☐ Profuse			Sediment Odors ☒ Normal ☐ Sewage ☐ Petroleum ☐ Chemical ☐ Anaerobic ☐ Other (Specify): _____			Smothering of Substrates Sand Smothering: None ☐ Slight ☐ Moderate ☒ Severe ☐ Silt Smothering: None ☐ Slight ☐ Moderate ☒ Severe ☐ Algae Smothering: None ☒ Slight ☐ Moderate ☐ Severe ☐		
SUBSTRATE TYPE Assessment Tool: ☒ SCI ☒ RPS ☒ LVS ☐ LCI ☐ BioRecon			WATER QUALITY					
Woody Debris (Snags) <u>3%</u> <u>5</u> Undercut Banks / Roots <u>1%</u> <u>5</u> Leaf Packs or Mat <u>4%</u> <u>5</u> Aquatic Vegetation <u>0.0%</u> <u>1</u> Rock or Shell Rubble... Sand..... <u>4</u> Mud / Muck / Silt Other Other			Depth (M) <u>0.15</u> Temp. (°C) <u>13.84</u> pH (SU) <u>4.21</u> D.O. (MG/L) <u>6.01</u> D.O. Sat (%) <u>58.1</u> Cond. (UMHO/CM) <u>28</u> Salinity (PPT) <u>0.01</u> SECCHI (M) <u>0.3</u> Top: Mid: Bottom: ☒ VOB Meter ID: _____ TOTAL DEPTH <u>0.3</u>					
ABUNDANCE Not Obs. Rare Common Abundant Periphyton: ☐ ☒ ☐ ☐ Fish: ☒ ☐ ☐ ☐ Aquatic Plants: ☐ ☒ ☐ ☐ Iron/Sulfur Bacteria: ☒ ☐ ☐ ☐			Water Odors Normal ☒ Petroleum ☐ Sewage ☐ Chemical ☐ Other ☐ Water Sample Taken? ☐ Yes ☐ No Sample Preserved? ☐ Yes ☐ No Lot Number: _____ Exp: _____ Algae Sample Taken? ☐ Yes ☒ No Sample Preserved? ☐ Yes ☐ No Lot Number: <u>NA</u> Exp: <u>NA</u>					
			Water Surface Oils Normal ☒ Sheen ☐ Globbs ☐ Slick ☐ Other ☐ Color Tannic ☒ Green (Algae) ☐ Clear ☐ Other (Specify) ☐ Clarity Clear ☐ Slightly Turbid ☒ Turbid ☐ Opaque ☐					
			System Type: Stream ☒ Lake ☐ Wetland ☐ Estuary ☐ Other (Specify) ☐					
AMBIENT FIELD CONDITIONS / NOTES: ☒ The antecedent hydrologic conditions have been met to my best knowledge.								
SAMPLING TEAM <u>Blake Spencer & Avril Wood-McGrath</u>				SIGNATURE: <u>[Signature]</u>		DATE: <u>3/19/19</u>		

Entered by: ~~AWM~~ 3/26/19
 AC by: AWM 4/4/19

SBIO: 79279~ RPS: 9270~

DEP FORM FD 9000-25 Rapid Periphyton Survey Field Sheet

Site: <u>G2WA0010</u>					County: <u>GLF</u>		Date: <u>3/19/19</u>		Investigators: <u>Blake Sponer</u>	
					STORET Station Number: <u>G2WA0010</u>					
Transect (m)	Point 1=right 9=left	Algal Thickness Rank (N-6, X)	Estimated	Canopy Cover	Transect (m)	Point 1=right 9=left	Algal Thickness Rank (N-6, X)	Estimated	Canopy Cover	
0	1	N			60	1	N			
	2					2				
	3					3				
	4					4				
	5			41✓		5			36✓	
	6					6				
	7					7				
	8					8				
	9	N				9	N			
10	1	N			70	1	N			
	2					2				
	3					3				
	4					4				
	5			51✓		5			68✓	
	6					6				
	7					7				
	8					8				
	9	N				9	N			
20	1	N			80	1	N			
	2					2				
	3					3				
	4					4				
	5			64✓		5			24✓	
	6					6				
	7					7				
	8					8				
	9	N				9	N			
30	1	N			90	1	N			
	2					2				
	3					3				
	4					4				
	5			52✓		5			52✓	
	6					6				
	7					7				
	8					8				
	9	N				9	N			
40	1	N			100	1	N			
	2					2				
	3					3				
	4					4				
	5			38✓		5			21✓	
	6					6				
	7					7				
	8					8				
	9	N				9	N			
50	1	N				1	N			
	2					2				
	3					3				
	4					4				
	5			40✓		5				
	6					6				
	7					7				
	8					8				
	9	N				9	N			

Record "N" and check "Estimated" for points deeper than the Secchi depth; algae are presumed absent. Check "Estimated" if thickness estimated for deep points which can be seen but not reached.

Record "X" for points shallower than Secchi depth for which substrate cannot be seen or reached with the hand. No estimated rank.

Record canopy cover as the number of small densiometer quadrants (out of 96) that HAVE canopy cover. Measure facing upstream at point 4, 5, or 6.

Collect algal mat sample following DEP SOP FS 7240 if the percentage of total sampled points with a thickness rank of 4, 5, or 6 is >20%.

Secchi depth 108
 Estimated? N

points ranked 4-6 0
 total points assessed 99
 % points ranked 4-6 0

(Exclude X's)

Check accompanying data collected at same site/date.

Algal mat sample N
 Linear Veg Survey ✓
 Habitat Assessment ✓
 SCI/Biorecon ✓
 Water sample ✓

RQ-2018-10-08-27

Algal Thickness Rank	
N	rough, no algae, slimy, algae up to 1mm
3	>1mm - 6mm
4	>6mm - 20mm
5	>20mm - 10 cm
6	>10 cm

(> 3 considered smothered)

(N to 1 mm)

(3) 6mm

(4) 20mm

(5) 10cm

(6)

Entered by: ~~SEA~~ 3/26/19
QC by: ~~AMM~~ 4/5/19

DEP Form FD 9000-5 Stream/River Habitat Assessment Field Sheet

5870: 79279

3/19/19

SAMPLING AGENCY:
Florida Department of Environmental Protection

**Big Branch
Downstream
of Road 5**

WIN ID / Field ID



G2WA0010

RECEIVING BODY OF WATER:

Stone Mill Creek

FIELD ID/NAME:

G2WA0010

REMARKS:

HA ID: 15696

COUNTY:

6014

Habitat Parameter	Optimal	Suboptimal	Marginal	Poor
Primary Habitat Components Snag Leaf Roots Rock Aquatic Vegetation	Four or more major productive habitats present (snags, tree roots, aquatic vegetation, leaf packs (partially decayed), rock)	Three major productive habitats present. Adequate habitat. Some substrates may be new fall (fresh leaves or snags)	Two major productive habitats present. Less than desirable habitat, frequently disturbed or removed	One or less major productive habitat. Lack of habitat is obvious, substrates unstable or smothered
Substrate Diversity <u>11</u>	20 19 18 17 16	15 14 13 12 <u>11</u>	10 9 8 7 6	5 4 3 2 1
Substrate Availability <u>2</u> <u>8</u> %	Major productive habitat present at site (>30% 27.2% 25.8% 24.4% 26.6%) 20 19 18 17 16	Major productive habitat, by aerial extent (21.6% 20.2% 18.8% 17.4% 16%) 15 14 13 12 11	6% to 15% major productive habitat (15% 13% 11% 9% 6%) 10 9 8 <u>7</u> 6	Less than 5% major productive habitat 5 4 3 2 1
Water Velocity <u>20</u> <u>0.33</u> m/s	Max. observed at typical transect: > 0.25 m/sec. But < 1 m/sec ≥0.33 0.31 0.29 0.27 >0.25 <u>20</u> 19 18 17 16	Max. observed at typical transect: >0.1 to 0.25 m/sec 0.25 0.21 0.17 0.13 >0.1 15 14 13 12 11	Max. observed at typical transect: 0.05 to 0.1 m/sec 0.1 0.09 0.07 0.06 0.05 10 9 8 7 6	Max. observed at typical transect: <0.05 m/sec; or spate occurring: > 1 m/sec <0.05 0.04 0.03 0.01 <0.01 5 4 3 2 1
Habitat Smothering <u>8</u> ----- Primary Score <u>46</u>	Adequate number of stable pools (1-2 per 12 times width) and <25% of habitats affected by sand, silt, or algae. 20 19 18 17 16	Adequate number of stable pools (1-2 per 12 times width) and >25% of habitats affected by sand, silt, or algae. 15 14 13 12 11	Does not have required number of stable pools (1-2 per 12 x width) and/or has shallow pools (<2 x prevailing depth). 10 9 8 7 6	Stable pools are absent. Most habitats affected by sand, silt, or algae accumulation. 5 4 3 2 1
Secondary Habitat Components Artificial Channelization <u>20</u>	Expected sinuosity given the stream width. No evidence of dredging or artificial straightening. No spoil banks. 20 19 18 17 16	Good sinuosity within old channelized area. Evidence of dredging in the past (>25 yrs) but mostly recovered. May have spoil banks. 15 14 13 12 11	Straightened with trapezoidal cross section, but has a small degree of sinuosity developed within channelized area. May have spoil banks. 10 9 8 7 6	Straightened or engineered by dredging, has trapezoidal or box cut cross section, lacks required pools. May have spoil banks. 5 4 3 2 1
Bank Stability Right Bank <u>10</u> Left Bank <u>10</u> If Banks are Pipe Clay, Bed Rock or Concrete at Bank full: Optimal	Bankfull > 60% of bank height. Slope of bank ≤ 60° from bankfull to top of bank. Bankfull is within or above the root zone with few raw, eroded areas. (+,+,+) 10 9	Only meets 2 of the 3 requirements for optimal bank stability. (+,-,-) 8 7 6	Only meets 1 of the 3 requirements for optimal bank stability. (+,-,-) 5 4	Bankfull < 60% of bank height. Slope of bank > 60°. Bankfull is below the root zone with raw, eroded areas. (-,-,-) 3 2 1
Riparian Buffer Zone Width Right Bank <u>9</u> Left Bank <u>9</u>	Width of vegetation greater than 18 m 10 9	Width of vegetation >12 to 18m 8 7 6 (18m 15m 12m)	Width of vegetation 6 to 12 m. human activities close to system 5 4 (9m)	Less than 6 m of buffer zone due to intensive human activities 3 2 1 (6-5m) (4-3m) (<2m)
Riparian Zone Vegetation Quality Right Bank <u>9</u> Left Bank <u>9</u> ----- Secondary Score <u>76</u>	Over 80% of riparian surfaces consist of normal, expected plant community for given sunlight & habitat conditions (e.g., native plants; tree, shrub, and forbs represented, if appropriate). Minimal disturbance. 10 9	>50% to 80% of riparian zone is undisturbed (normal, expected plant community for given sunlight & habitat conditions). Some disruption in community observed. 8 7 6	25% to 50% of riparian zone is undisturbed (normal, expected plant community for given sunlight & habitat conditions). Disruption obvious. 5 4	Less than 25% of riparian zone is undisturbed (normal, expected plant community for given sunlight & habitat conditions). 3 2 1

122

TOTAL SCORE

Date:

3/19/19

Analyst:

Blake Spencer

Signature:

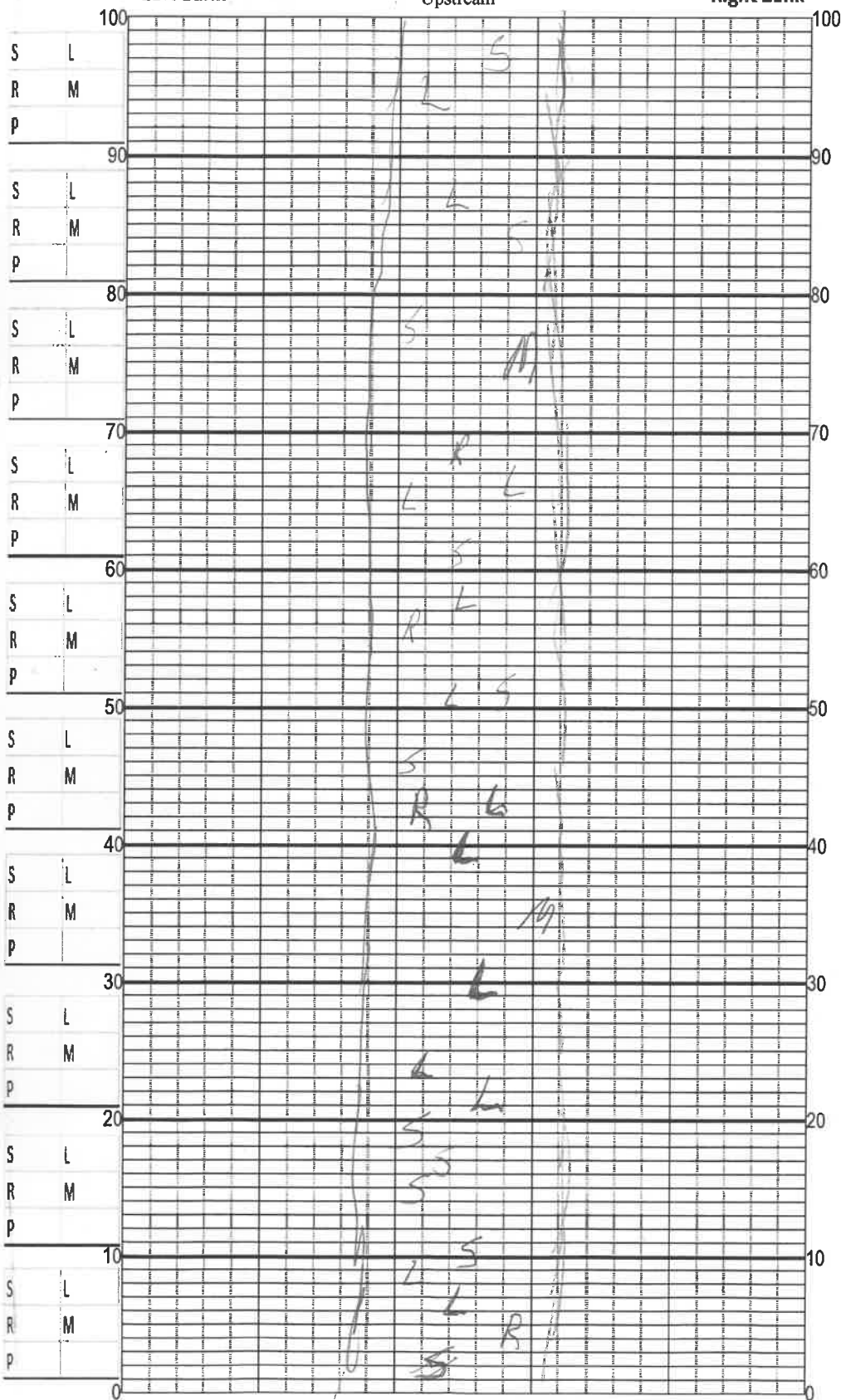
[Signature]

DEP Form FD 9000-4 Stream/River Habitat Assessment Sketch Sheet

Left Bank

Upstream

Right Bank



Location: G2WACO10
Big Branch Downstream Rd 5
Date: 3/19/19
Sampler:

100 m: Latitude _____
Longitude _____
0 m: Latitude _____
Longitude _____

Substrates: Code key, draw proportionate habitat abundance. %

☐ S Snags 3%
☐ R Roots/undercut banks 1%
☐ L Leaf Packs (or mats) 4%
☐ M Aquatic Macrophytes 0.01%
☐ Rc Rock _____
☐ _____
☐ P Pools total # observed = _____
range expected = _____

Average width 3 m
Average depth 0.3 m
Velocity measured at 80 meter mark.
Velocity 0.33 m/s

WQ & chemistry taken at 80 meter mark.

Habitat Smothering:
Note areas (on map) where sand or silt is smothering substrates, limiting habitability.

Bank Stability:
Note areas (on map) with unstable, eroding banks.

Riparian Buffer Width:
Note areas (on map) where natural vegetation is altered or eliminated.

Notes/Plants Observed:
2m² = 13.2 Sweeps

Meter Mark	Depth (m)	Width (m)	Velocity Measurement (Sec)
80	0.5	3m	0.33
Avg.			

Length of grid represents 100 m of stream (not linear meters). (Horizontal scale is double vertical scale, draw proportionately).

Expected Number of Pools

$$\left(\frac{100}{12 * \text{W}} \right) * 1 =$$

$$\left(\frac{100}{12 * \text{W}} \right) * 2 =$$

# of Sweeps	Conversion	m ²	%
Snag	÷ 8	m ²	
Root	÷ 8	m ²	
Leaf	÷ 8	m ²	
Macrophyte	÷ 8	m ²	
Rock	÷ 8	m ²	
Total Available Habitat		m ²	
Total Area		m ²	
Total Unavailable Habitat		m ²	

DEP FORM FD 9000-32: LINEAR VEGETATION SURVEY FIELD SHEET

Waterbody: Big Branch downstreams Rd 5 Date: 3/19/19 County: GLHF Storet Number: G2WA0010

Analyst: Blake Spencer Signature: [Signature]

Comments: SMP Sampling < 2m²

Instructions: Note taxa growing in the water with a checkmark if present, "D" if dominant, and "C" if codominant (dominance only if 1 m² of taxa present). Note in the boxes below if no dominant are selected, and note total macrophyte abundance rank for each section. Only the most common taxa are listed, so use blank spaces for additional taxa names.

HERBACEOUS SPECIES	Meter Mark										Specimen collected (check)	HERBACEOUS SPECIES	Meter Mark										Specimen collected (check)
	0-10	10-20	20-30	30-40	40-50	50-60	60-70	70-80	80-90	90-100			0-10	10-20	20-30	30-40	40-50	50-60	60-70	70-80	80-90	90-100	
Alternanthera philoxeroides												Myriophyllum heterophyllum											
Bacopa caroliniana												Najas guadelupensis											
Bacopa monnieri												Nuphar luteum											
Bidens mitis												Orontium aquaticum											
Boehmeria cylindrica												Panicum hemitomon											
Centella asiatica												Panicum repens											
Ceratophyllum demersum												Panicum rigidulum											
Chara												Peltandra virginica											
Cicuta maculata												Pistia stratioides											
Cladium jamaicense												Polygonum glabra											
Colocasia esculenta												Polygonum hydropiperoides											
Commelina diffusa												Polygonum punctatum											
Commelina virginica												Pontedaria cordata											
Crinum americanum												Potamogeton illinoensis											
Diodia virginiana												Rhynchospora inundata											
Eichhornia crassipes												Rosa palustris											
Eleocharis (wispy viviparous)												Ruellia simplex											
Hydrilla verticillata												Rumex verticillatus											
Hydrocotyle												Sacciolepis striata											
Hygrophila polysperma												Sagittaria kurziana											
Hymenocallis												Sagittaria lancifolia											
Lachnanthes caroliniana												Sagittaria latifolia											
Landoltia punctata												Salvinia minima											
Lemna												Samolus parviflora											
Limnophila sessiflora												Saururus cernuus											
Ludwigia leptocarpa												Scirpus (schenoplectus) californicus											
Ludwigia palustris												Sparganium americanum											
Ludwigia peruviana												Typha											
Ludwigia repens												Vallisneria americana											
Luziola fluitans												Zizania aquatica											
Micranthemum glomeratum																							
Micranthemum umbrosum																							
Mikania scandens																							
Myriophyllum aquaticum																							

If no Dominant or Co-Dominant were selected, indicate with "X"

Indicate % cover macrophytes per section

0-5% Macrophyte Coverage											
>5 and ≤10% Macrophyte Coverage											
>10 and ≤25% Macrophyte Coverage											
>25 and ≤50% Macrophyte Coverage											
> 50% Macrophyte Coverage											

Notes:

X < 2m²

CALIBRATION AND VERIFICATION LOG (FDEP SOP FT 1000-FT 1500, FD 1000-FD 4000)

Boldly "X" this box if there is qualified data on this name

Meter ID: Biology #2

RQ: 2018-10-08-27

Project: SMP

Notes: (1) Always wait for meter to stabilize before recording any readings.

(2) Report all digits displayed. Do not round before reporting measurements. (See special instructions for depth).

(3) For Calibrations, record calibrated meter reading. Do not record initial meter reading before calibration.

Circle/Fill In: Lab Calibration or Calibration/Verification on Site _____

Temperature (Quarterly) FT 1400

Date of Last Temperature Verification _____

DO DEP SOP FT 1500	Name	Date	Time CT-ET	Temp	D.O. Chart mg/L	Meter D.O. mg/L	% DO	Probe Charge	Probe Gain	Pass / Fail	Lab / Field
Calibr.	Blake Spencer	3/19/19	0725	19.00	9.276	9.28	100	58.4	—	P/F	L/F
ICV	1	1	0726	19.00	9.276	9.27	100	58.4	—	P/F	L/F
CCV	Blake Spencer	3/19/19	1541	23.43	8.514	8.62	101.3	54.3	—	P/F	L/F
CCV										P/F	L/F

DO Acceptance criteria from Table ± 0.3 mg/L.

Optical: DO gain range 0.85 to 1.15; DO charge N/A.

Rapid-Pulse Sensors: DO Gain Range 0.7 to 1.4; DO Charge Range 25-75.

Steady-state & Galvanic Sensors: DO Gain & Charge N/A.

Spec. Cond. FT 1200	Name	Date	Time CT-ET	Lot #	Expir. Date	Standard μ mhos/cm	Meter Reading μ mhos/cm	Pass / Fail	Lab / Field
Calibr.	Blake Spencer	3/19/19	0729	180221A	03/2019	500	500	P/F	L/F
ICV	1	1	0730	180221A	03/2019	500	500	P/F	L/F
CCV	Blake Spencer	3/19/19	1544	1805F81	05/2020	100	104	P/F	L/F
CCV								P/F	L/F

Conductivity Acceptance criteria $\pm 5\%$

pH DEP SOP FT 1100	Name	Date	Time CT-ET	Lot #	Expir. Date	pH Buffer SU	Meter reading SU	mV	Pass / Fail	Lab / Field
Calibr.	Blake Spencer	3/19/19	0739	180403C	10/2019	7.0	7.00	-16.7	P/F	L/F
Calibr.	1	1	0748	180621D	07/2019	4.0	4.00	156.7	P/F	L/F
Calibr.	1	1	0756	180621F	01/2020	10.0	9.99	-186.7	P/F	L/F
ICV	1	1	0757	180621F	01/2020	10.0	9.99	-186.6	P/F	L/F
CCV	Blake Spencer	3/19/19	1554	180621D	07/2019	4.0	3.95	159.0	P/F	L/F
CCV									P/F	L/F

pH Acceptance criteria ± 0.2 SU; mV pH 7 Range 0 ± 50 ;

mV pH 4 Range $+180 \pm 50$;

mV pH 10 Range -180 ± 50 ;

If mV are recorded: slope from 7 to 10 _____, slope from 4 to 7 _____ (both must be between 165 and 180 mV)

Is meter equipped with depth sensor? Yes / No If yes, list date of last quarterly depth verification _____

Depth Sensor (Daily Calibration & ICV)	Name	Date	Time CT-ET	Calibrated Value (0.00 or Offset), meters	ICV Value meters	Pass / Fail	Lab / Field
Pressure mode in air	Blake Spencer	03/19/19	0758	0.00	0.00	P/F	L/F

Report two decimal places. Round numbers ≤ 4 down, ≥ 5 up. ICV acceptance criteria $\pm 5\%$ or ± 0.05 m, whichever is greater.

COMMENTS:

last revised Jan 25 2019

Arv. 1 wood-misgrith

1921 2000 : 1921

[illegible]

Group: A	Bottle Type:	P-1L	# of Bottles: 2	Preservative:	ICE	Enter Number of Bottles Sent to Lab	1
	ALKALINITY						
	TURBIDITY						
	W-CL-IC						
	W-COLOR						
	W-F						
	W-SO4-IC						
	W-TDS						
	W-TSS						
Group: A	Bottle Type:	BP-1L	# of Bottles: 2	Preservative:	ICE	Enter Number of Bottles Sent to Lab	1
	CHLSUITE-W						
Group: A	Bottle Type:	P-250ML-WO-THI	# of Bottles: 2	Preservative:	ICE	Enter Number of Bottles Sent to Lab	1
	ECOLI-18QT						
Group: A	Bottle Type:	BG-500ML	# of Bottles: 3	Preservative:	ICE	Enter Number of Bottles Sent to Lab	3 Num 1
	W-E8321-DI						
	W-E8321-MS						
Group: A	Bottle Type:	P-500ML	# of Bottles: 2	Preservative:	HNO3	Enter Number of Bottles Sent to Lab	1
	W-ICP						
	W-ICPMS						
Group: A	Bottle Type:	P-500ML	# of Bottles: 2	Preservative:	ICE And H2SO4	Enter Number of Bottles Sent to Lab	1
	W-NH3						
	W-NO2NO3						
	W-S-A-TP						
	W-TKN						
	W-TOC						
Group: A	Bottle Type:	P-125ML	# of Bottles: 2	Preservative:	FILTER-ICE	Enter Number of Bottles Sent to Lab	1
	W-PO4-F						
Group: A	Bottle Type:	BG-1L	# of Bottles: 6	Preservative:	ICE	Enter Number of Bottles Sent to Lab	3 4 Num
	W-PSNP-TQ						
Group: B	Bottle Type:	PT-50ML	# of Bottles: 2	Preservative:	ICE	Enter Number of Bottles Sent to Lab	0
	ALGAL_ID						
Group: B	Bottle Type:	PJ-2L	# of Bottles: 4	Preservative:	Formalin	Enter Number of Bottles Sent to Lab	2

Group: B	Bottle Type:	PJ-2L	# of Bottles: 4	Preservative:	Formalin	Enter Number of Bottles Sent to Lab
	MI-FW-QLDC					2

Cooler Packing Worksheet for Request: RQ-2018-10-08-27

Group 2 SCIs

Ship Cooler On: 10/4/2018
Customer/Project: WAS-SECT/SMP

Assigned To: SHAIK_A
Requester: Curtis Musson
Priority: 3

850-245-8453
2600 Blair Stone Rd

Tallahassee, FL 32399

Attn: Curtis Musson

Comments:

No preservatives needed.

Group A: Nutrients, Metals, Some GC, Some LC, E. coli

Group B: SCI, Algal ID

Added a QC bottle for E8321 tests

Requested Analyses:

Bottle Group: A

of Sites: 2

Container ID: P-1L

Qty: 2 Preservation: ICE

Lot # 50071991

Description: Plastic Bottle 1L

Analysis

ALKALINITY

TURBIDITY

W-CL-IC

W-COLOR

W-F

W-SO4-IC

W-TDS

W-TSS

Description

Alkalinity in aqueous matrices as mg CaCO3/L

Turbidity in aqueous matrices

Chloride in aqueous matrices

True Color measured at 450 nm

Fluoride in aqueous matrices, without distillation (not valid for NPDES monitoring)

Sulfate in aqueous matrices

Total Dissolved Solids in aqueous matrices

Total Suspended Solids in aqueous matrices using a maximum of 250 mL of sample

Container ID: BP-1L

Qty: 2 Preservation: ICE

Lot # 12194441

Description: Brown Plastic Bottle 1L

Analysis

CHLSUITE-W

Description

Phytoplankton chlorophyll-a corrected, uncorrected, and phaeophytin by spectrophotometry

Container ID: P-250ML-WO-THI

Qty: 2 Preservation: ICE

Lot # L18038

Description: 250 ml Sterilized no tablet

Analysis

ECOLI-18QT

Description

Escherichia coli by Colilert 18 Quanti-Tray method - non-chlorinated water systems

Container ID: BG-500ML

Qty: 3 Preservation: ICE

Lot # 00071482

Description: Brown Glass Bottle 500ML

Affix BLUE dot to container.

Analysis

W-E8321-DI

W-E8321-MS

Description

Pesticides, herbicides, and other chemicals in water matrices by HPLC/MS/MS

Pesticides, herbicides, and other chemicals in water matrices by HPLC/MS/MS

Container ID: P-500ML

Qty: 2 Preservation: HNO3

Lot # 00071864

Description: Plastic Bottle 500 mL

Affix RED nitric acid dot to container.

Analysis

W-ICP

W-ICPMS

Description

Total Recoverable Metals analysis using ICP emission spectroscopy for aqueous samples supporting Clean Water Act Projects

Total Recoverable Metals analysis using ICP-MS for aqueous samples supporting Clean Water Act Projects

Container ID: P-500ML

Qty: 2 Preservation: ICE And H2SO4

Lot # 00071864

Description: Plastic Bottle 500 mL

Affix YELLOW sulfuric acid dot to container.

Analysis

W-NH3

W-NO2NO3

W-S-A-TP

W-TKN

W-TOC

Description

Ammonia in aqueous matrices as mg N/L

Nitrite/Nitrate in aqueous matrices as mg N/L

Total Phosphorus in aqueous matrices as mg P/L

Total Kjeldahl Nitrogen in aqueous matrices

Nonpurgeable Organic Carbon in aqueous matrices

Container ID: P-125ML

Qty: 2 Preservation: FILTER-ICE

Lot # 00068347

Description: Plastic Bottle 125 mL

Analysis

W-PO4-F

Description

Ortho-phosphate, dissolved, in filtered, aqueous matrices as mg P/L

Container ID: BG-1L

Qty: 6 Preservation: ICE

Lot # 050 71178

Description: Brown Glass Bottle 1L

Affix BLUE dot to container.

Analysis

W-PSNP-TQ

Description

Organonitrogen and phosphorus pesticides in water matrices by GC/MS/MS

Bottle Group: B

of Sites: 2

Container ID: PT-50ML

Qty: 2 Preservation: ICE

Lot # 050 3775003

Description: Plastic Tube 50 mL

Analysis

ALGAL_ID

Description

Qualitative assessment of algal taxa present without counts

Container ID: PJ-2L

Qty: 4 Preservation: Formalin

Lot # B10111111

Description: Plastic Jar 2 L

Analysis

MI-FW-QLDC

Description

No. Taxa of FW macroinverts, qual samp, 20 dipnets.

Cooler Packed By: ABP

Number of Coolers: 3

Date: 10-18

Kit must also include:

- ☒ Field Sheets
- ☒ Temperature Control Bottle
- ☒ FedEx Bills, if applicable
- ☐ Plastic Bags/Zip Ties
- ☒ Acid Labels (sets of 24)

If Preservation Included:

ID _____	Exp _____	Lot # _____
ID _____	Exp _____	Lot # _____
ID _____	Exp _____	Lot # _____
ID _____	Exp _____	Lot # _____
ID _____	Exp _____	Lot # _____

PLEASE RETURN ALL COOLERS FOR RQ-2018-10-08-27