

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

Boldly "X" this box if there are qualified data on this page.

Meter ID: 54764

RQ: 2022-03-14-55

Project: Algae R. Melrose

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.

Temperature (Quarterly) FT 1400

Date of Last Temperature Verification

2/1/22

DO DEP SOP FT 1500	Name	Date	Time CT-ET	Temp °C	Baro- meter mmHg	D.O. Chart mg/L	Meter D.O. mg/L	% DO	Probe Charge	Probe Gain	Pass / Fail	Lab / Field
Calibr.	Brian Davis	3/17/22	1016	21.7	762.3	8.8	8.8	100.3	/	1.07	P/F	L/F
ICV	↓	↓	1017	21.7	762.3	8.8	8.82	100.2	/	1.07	P/F	L/F
CCV	Kim Appleby	✓	1402	26.6	760.1	8.0	8.06	100.4	-	1.07	P/F	L/F
CCV			1707								P/F	L/F

DO Acceptance criteria from Table ± 0.3 mg/L.

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

Optical: DO gain range 0.85 to 1.15 (Pro DSS 0.75 to 1.50); DO charge N/A. Steady-state & Galvanic Sensors: DO Gain & Charge N/A.

Spec. Cond. FT 1200	Name	Date	Time CT-ET	Lot #	Explr. Date	Standard μ mhos/cm	Meter Reading μ mhos/cm	Pass / Fail	Lab / Field
Calibr.	Brian Davis	3/17/22	955	210917B	9/22	1000	1000	P/F	L/F
ICV	↓	↓	958	210917A	9/22	100	100.7	P/F	L/F
CCV	Kim Appleby	↓	1611	211122B	12/22	1413	1417	P/F	L/F
CCV			1711					P/F	L/F

Conductivity Acceptance criteria $\pm 5\%$

pH DEP SOP FT 1100	Name	Date	Time CT-ET	Lot #	Explr. Date	pH Buffer SU	Temp °C	Meter reading SU	mV	Pass / Fail	Lab / Field
Calibr.	Brian Davis	3/17/22	1003	2112B19	12/23	7.01	22.0	7.01	-27.1	P/F	L/F
Calibr.	↓	↓	1005	2201D88	1/24	4.00	21.9	4.00	151.8	P/F	L/F
Calibr.	↓	↓	1008	2202A63	7/23	10.04	21.9	10.04	-198.8	P/F	L/F
ICV	↓	↓	1012	2112B19	12/23	7.01	22.0	7.05	-26.5	P/F	L/F
CCV	Kim Appleby	↓	1716	2201D88	1/2024	4.00	21.5	3.99	151.2	P/F	L/F
CCV	↓	↓	1730	2202A63	7/2023	10.04	21.4	9.99	-197.1	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 10 171.7, slope from 4 to 7 178.9 (both must be between 165 and 180 mV)

Does meter have a depth sensor that will be used to measure total depth & sample depth? YES / NO / NA (not surf. water project)

If YES, complete daily Calibr. & ICV below and list date of last quarterly depth verification: 2/1/22

If NO, what will be used? (circle one) Secchi Disk Line / Sonar Unique ID: _____; Date of last 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	Brian Davis	3/17/22	1018	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:

6116 Trout St, Melrose FL 32666

Cyanobacteria Bloom Response Field Data Sheet

2022 RQ-2021-03-14-55		Collected By:	Kim Appleby & Brian Davis	
Customer	21FLA	Field Report Prepared By:	Kim Appleby	
Project ID:	BLOOM_RESP	Sampling Agency:	FDEP	
Field ID: NEHAB0069 Melrose Lake N Shore		Comments: Algae seen suspended in water column. Very fine algae particles densely dispersed.		
		Collection Equipment:	ortho kit #3	
Matrix:	Fresh	Grab	Coordinates:	29.7164, -82.0518
Tide:	☐ Rising ☐ Falling ☐ Slack ☒ N/A	High Tide Time:	-	Low Tide Time: -

Water Quality										
Date	Time ☒ EST ☐ CEN	D.O. (mg/L)	D.O. (%)	Temp °C	pH (SU)	Sample Depth (m)	Cond. (umho/cm)	Salinity (PPT)	Secchi Disk (m)	Total Depth (m)
3/17/22	1405	10.19	115.5 114.5	21.7	7.60	0.3	70.4	0.03	0.9	5.1
	1407	5.26	53.3	16.2	6.29	4.64	73.1	0.03		

Bloom Observations					
Algal Bloom Observed?	☒ Yes	☐ No			
Water Surface	☒ Clear	☐ Scum	☐ Globs	☐ Slick	
Water Clarity	☒ Clear	☐ Slightly Turbid	☐ Turbid	☐ Opaque	
Bloom Color	☒ Green	☐ Red	☐ Brown	☐ Other: _____	
Algae Distribution	☒ Suspended in water column	☒ On surface	☐ Other: _____		
Water Odors	☐ Normal	☐ Sewage	☐ Petroleum	☒ Other: Anaerobic/algae	

Parameter Suite	Parameter Methods	Preservation	pH Check	#Bottles Sent to Lab	Bottle Group
Bloom ID (PT-50ML)	☒ BLOOM-ID	☒ Ice		1	A
Chlorophyll (BP-1L)	☒ CHLSUITE-W	☒ Ice		1	B
Toxins (BG-WD250)	☒ W-MCYST-AA	☒ Ice		1	B
Preserved Nutrients (500mL HDPE)	☒ W-NH3 / W-NO2NO3 / W-TKN / W-S-A-TP	☒ Ice ☒ H2SO4	☒ <2	1	B
	Lot SA1105060	Exp: 4/30/22	☐ <2		
Filtered Nutrients (P125mL)	☒ W-PO4-F	☒ Field Filtered 0.45um Filter	☒ Ice	1	B
Quantitative Algae	☐ DTY-QN-C / PKD-QN-C	☐ Ice	☐ Lugols		

Relinquished By:	Date/Time	Number of Coolers Shipped	Received By:	Date/Time
Kim Appleby	3/17/22 1600	1		