

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: Betty 67

RQ-

2017-10-30-09

Project:

STATUS

- 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

12/1/17

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.	Natalie Ayala	12/6/17	0748	21.72	8.79	8.80	100.1	35.9	1.00305	<u>P</u> /F	<u>P</u> /F
ICV	↓	↓	0749	21.74	8.79	8.80	100.2	35.9	1.00305	<u>P</u> /F	<u>P</u> /F
CCV	T. Riordan	↓	1415	21.98	8.7	8.71	99.7	39.0	1.00305	<u>P</u> /F	<u>P</u> /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 hos/cm	Meter Reading μ hos/cm	Pass / Fail	Lab / Field
Calibr.	Natalie Ayala	12/6/17	0751	100 170931	9/18	1000	1000	<u>P</u> /F	<u>P</u> /F
ICV	↓	↓	↓	171023	11/18	100	99	<u>P</u> /F	<u>P</u> /F
CCV	T. Riordan	↓	1415	171023	11/18	100	98	<u>P</u> /F	<u>P</u> /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.	Natalie Ayala	12/6/17	0754	165674	8/18	7.0	7.00	-25.3	<u>P</u> /F	<u>P</u> /F
Calibr.	↓	↓	↓	171629	4/19	4.0	4.00	14.6	<u>P</u> /F	<u>P</u> /F
Calibr.	↓	↓	↓	172191	3/19	10.0	10.00	-202.7	<u>P</u> /F	<u>P</u> /F
ICV	↓	↓	↓	171629	4/19	4.00	4.02	148.7	<u>P</u> /F	L/F
CCV	T. Riordan	↓	1415	172191	3/19	10.0	9.87	-144.4	<u>P</u> /F	<u>P</u> /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						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:

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 page

Meter ID: 300P NO N

RQ: 2017-12-04-SS

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 12/1/17

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.	Mike Drennen	12/6/17	745	22.39	8.677	8.68	100.0	43.1	91533	(P) F	(L) F
ICV				22.38	8.677	8.66	99.9	44.1		P / F	L / F
CCV	Leif Boman	12/6/17	15:00	22.62	8.644	8.60	99.0	46.1	092051	(P) F	(L) F
CCV				38	77					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 hos/cm	Meter Reading μ hos/cm	Pass / Fail	Lab / Field
Calibr.	Mike Drennen	12/6/17		170831	09/18	1000	1000	P / F	L / F
ICV				171023	11/18	100	100	P / F	L / F
CCV	Leif Boman		15:00	171023	11/18	100	99	(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.		12/6/17		165274	08/18	7.0	7.00	-38.3	(P) F	(L) F
Calibr.				171629	04/19	4.0	4.00	138.5	(P) F	(L) F
Calibr.				172191	03/19	10.0	10.00	-215.8	(P) F	(L) F
ICV				172191	03/19	10.0	10.00	-215.4	P / F	L / F
CCV	Leif Boman		15:00	171629	04/19	4.0	4.03	136.7	(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						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:

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: Tally-1 / AB

RQ: 2017-12-04-SS

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 12/1/17

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.	Mike Drennen	12/6/17	8:35	21.93	8.744	8.76	100.0	70.6	1.0658	☒ P / ☐ F	☒ L / ☐ F
ICV				21.91	8.744	8.75	99.0	70.6		☒ P / ☐ F	☒ L / ☐ F
CCV				22.93	8.578	8.77	102.2	70.6	1.0658	☒ P / ☐ F	☒ L / ☐ F
CCV			1420							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; DO charge N/A.

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

Spec. Cond. FT 1200	Name	Date	Time CT-ET	Lot #	Expir. Date	Standard μ hos/cm	Meter Reading μ hos/cm	Pass / Fail	Lab / Field
Calibr.			8:35	170831	9/18	1000	1000	☒ P / ☐ F	☒ L / ☐ F
ICV				171023	11/18	100	101	☒ P / ☐ F	☒ L / ☐ F
CCV				171023	11/18	100	101	☒ P / ☐ F	☒ L / ☐ F
CCV			1420					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.			8:35	165674	8/18	7.0	7.00	-26.5	☒ P / ☐ F	☒ L / ☐ F
Calibr.				171629	4/19	4.0	4.00	150.0	☒ P / ☐ F	☒ L / ☐ F
Calibr.				172191	3/19	10.0	10.00	-204.2	☒ P / ☐ F	☒ L / ☐ F
ICV				172191	3/19	10.0	10.00	-203.9	☒ P / ☐ F	☒ L / ☐ F
CCV				171629	4/19	10.0	10.20	-216.4	☒ P / ☐ F	☒ L / ☐ F
CCV			1420						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						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: