

Sea-Bird Electronics, Inc.

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SENSOR SERIAL NUMBER: 1856
CALIBRATION DATE: 09-Dec-11

SBE 37 CONDUCTIVITY CALIBRATION DATA
PSS 1978: C(35,15,0) = 4.2914 Siemens/meter

COEFFICIENTS:

g = -1.025921e+000
h = 1.456853e-001
i = -8.824341e-005
j = 3.114130e-005

CPcor = -9.5700e-008
CTcor = 3.2500e-006
WBOTC = 6.0924e-006

BATH TEMP (ITS-90)	BATH SAL (PSU)	BATH COND (Siemens/m)	INST FREQ (Hz)	INST COND (Siemens/m)	RESIDUAL (Siemens/m)
22.0000	0.0000	0.00000	2653.64	0.00000	0.00000
1.0000	34.9860	2.98908	5242.63	2.98908	-0.00000
4.4999	34.9656	3.29741	5439.27	3.29741	0.00000
15.0000	34.9212	4.28312	6024.18	4.28311	-0.00001
18.5000	34.9111	4.62958	6216.42	4.62959	0.00001
24.0000	34.8997	5.18966	6514.86	5.18966	0.00000
29.0000	34.8919	5.71330	6781.66	5.71329	-0.00002
32.5000	34.8848	6.08658	6965.43	6.08659	0.00001

$$f = \text{INST FREQ} * \sqrt{1.0 + \text{WBOTC} * t} / 1000.0$$

$$\text{Conductivity} = (g + hf^2 + if^3 + jf^4) / (1 + \delta t + \epsilon p) \text{ Siemens/meter}$$

$$t = \text{temperature}[^{\circ}\text{C}]; p = \text{pressure}[\text{decibars}]; \delta = \text{CTcor}; \epsilon = \text{CPcor};$$

$$\text{Residual} = \text{instrument conductivity} - \text{bath conductivity}$$

