

Sea-Bird Electronics, Inc.

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SENSOR SERIAL NUMBER: 2322
CALIBRATION DATE: 04-Feb-14

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

COEFFICIENTS:

g = -1.070799e+000
h = 1.504471e-001
i = -4.051796e-005
j = 2.779028e-005

CPcor = -9.5700e-008
CTcor = 3.2500e-006
WBOTC = 3.3120e-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	2666.96	0.00000	0.00000
1.0000	34.6713	2.96475	5170.01	2.96475	0.00000
4.5000	34.6514	3.27070	5361.53	3.27069	-0.00000
15.0000	34.6087	4.24883	5931.77	4.24882	-0.00001
18.5000	34.5997	4.59273	6119.39	4.59273	0.00001
24.0000	34.5899	5.14866	6410.79	5.14867	0.00001
29.0000	34.5845	5.66861	6671.52	5.66861	-0.00000
32.4999	34.5817	6.03968	6851.35	6.03968	-0.00000

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

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

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

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

