



Sea-Bird Scientific
13431 NE 20th Street
Bellevue, WA 98005
USA

+1 425-643-9866
seabird@seabird.com
www.seabird.com

SENSOR SERIAL NUMBER: 0475
CALIBRATION DATE: 13-Dec-17

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

COEFFICIENTS:

g = -1.042230e+000
h = 1.411015e-001
i = -3.488992e-004
j = 4.744127e-005

CPcor = -9.5700e-008
CTcor = 3.2500e-006
WBOTC = -8.3216e-005

BATH TEMP (° C)	BATH SAL (PSU)	BATH COND (S/m)	INSTRUMENT OUTPUT (Hz)	INSTRUMENT COND (S/m)	RESIDUAL (S/m)
22.0000	0.0000	0.00000	2726.07	0.00000	0.00000
1.0000	34.8100	2.97548	5345.98	2.97548	0.00000
4.5000	34.7903	3.28251	5546.66	3.28251	0.00000
15.0000	34.7481	4.26413	6144.08	4.26412	-0.00001
18.5000	34.7390	4.60922	6340.61	4.60922	0.00000
24.0000	34.7289	5.16706	6645.85	5.16707	0.00001
29.0000	34.7228	5.68873	6918.92	5.68872	-0.00000
32.5000	34.7184	6.06085	7107.24	6.06094	0.00009

$f = \text{Instrument Output(Hz)} * \sqrt{1.0 + \text{WBOTC} * t} / 1000.0$

t = temperature (°C); p = pressure (decibars); $\delta = \text{CTcor}$; $\epsilon = \text{CPcor}$;

Conductivity (S/m) = $(g + h * f^2 + i * f^3 + j * f^4) / (1 + \delta * t + \epsilon * p)$

Residual (Siemens/meter) = instrument conductivity - bath conductivity

