Sea-Bird Electronics, Inc.

13431 NE 20th Street, Bellevue, WA 98005-2010 USA

Phone: (+1) 425-643-9866 Fax (+1) 425-643-9954 Email: seabird@seabird.com

SENSOR SERIAL NUMBER: 0277
CALIBRATION DATE: 09-Jan-13

SBE 49 TEMPERATURE CALIBRATION DATA
ITS-90 TEMPERATURE SCALE

ITS-90 COEFFICIENTS

a0 = 9.082140e-004
a1 = 2.651948e-004
a2 = -8.219462e-007
a3 = 1.487549e-007

BATH TEMP (ITS-90)	INSTRUMENT OUTPUT(n)	INST TEMP (ITS-90)	RESIDUAL (ITS-90)
1.0000	763987.034	0.9999	-0.0001
4.5000	676730.898	4.5001	0.0001
15.0000	454432.254	14.9999	-0.0001
18.5000	393345.475	18.4999	-0.0001
24.0000	309473.237	24.0001	0.0001
29.0000	244919.780	29.0000	0.0000
32.5000	205635.695	32.5000	-0.0000

MV = (n - 524288) / 1.6e+007

R = (MV * 2.295e+010 + 9.216e+008) / (6.144e+004 - MV * 5.3e+005)

Temperature ITS-90 = $1/\{a0 + a1[ln(R)] + a2[ln^2(R)] + a3[ln^3(R)]\} - 273.15$ (°C)

Residual = instrument temperature - bath temperature

Date, Delta T (mdeg C)

● 12-Aug-12 -0.53
▲ 09-Jan-13 -0.00