

# Sea-Bird Electronics, Inc.

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SENSOR SERIAL NUMBER: 6627  
CALIBRATION DATE: 04-Dec-15

SBE 16plus V2 TEMPERATURE CALIBRATION DATA  
ITS-90 TEMPERATURE SCALE

## COEFFICIENTS:

a0 = 1.284597e-003  
a1 = 2.570650e-004  
a2 = 1.458183e-007  
a3 = 1.323346e-007

BATH TEMP (° C)	INSTRUMENT OUTPUT (counts)	INST TEMP (° C)	RESIDUAL (° C)
1.0000	649990.333	1.0001	0.0001
4.5000	577067.000	4.4999	-0.0001
14.9999	395541.000	15.0000	0.0001
18.5000	346748.091	18.5001	0.0001
23.9999	280543.417	23.9997	-0.0002
29.0000	230207.091	29.0000	0.0000
32.5000	199851.167	32.5000	0.0000

n = Instrument Output (counts)

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

$R = (MV * 2.900e+009 + 1.024e+008) / (2.048e+004 - MV * 2.0e+005)$

Temperature ITS-90 (°C) =  $1 / \{a_0 + a_1[\ln(R)] + a_2[\ln^2(R)] + a_3[\ln^3(R)]\} - 273.15$

Residual (°C) = instrument temperature - bath temperature

