



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

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

SENSOR SERIAL NUMBER: 3762
CALIBRATION DATE: 06-Apr-23

SBE 37 PRESSURE CALIBRATION DATA
1450 psia S/N 5751

COEFFICIENTS:

PA0 =	2.430573e-001	PTCA0 =	-1.912977e+002
PA1 =	6.734028e-002	PTCA1 =	5.779511e-002
PA2 =	-3.532263e-009	PTCA2 =	4.720649e-003
		PTCB0 =	2.540563e+001
		PTCB1 =	1.250000e-004
		PTCB2 =	0.000000e+000

PRESSURE SPAN CALIBRATION

THERMAL CORRECTION

PRESSURE (PSIA)	INSTRUMENT OUTPUT (counts)	TEMPERATURE (°C)	COMPUTED PRESSURE (PSIA)	RESIDUAL (%FSR)	TEMP (°C)	INSTRUMENT OUTPUT (counts)
14.43	22.1	22.2	14.37	-0.00	32.50	40.93
301.66	4289.5	22.2	301.63	-0.00	29.00	39.86
588.61	8553.7	22.3	588.55	-0.00	24.00	38.31
875.67	12822.5	22.3	875.66	-0.00	18.50	36.65
1162.92	17096.2	22.3	1162.96	0.00	15.00	36.06
1450.03	21367.8	22.3	1449.99	-0.00	4.50	34.64
1162.93	17096.0	22.3	1162.95	0.00	1.00	34.09
875.90	12826.6	22.4	875.93	0.00		
588.73	8556.9	22.4	588.77	0.00		
301.65	4289.5	22.4	301.63	-0.00	TEMPERATURE (°C)	SPAN
14.42	24.3	22.7	14.51	0.01	-5.00	25.41
					35.00	25.41

$$x = \text{instrument output} - \text{PTCA0} - \text{PTCA1} * t - \text{PTCA2} * t^2$$

$$n = x * \text{PTCB0} / (\text{PTCB0} + \text{PTCB1} * t + \text{PTCB2} * t^2)$$

$$\text{pressure (PSIA)} = \text{PA0} + \text{PA1} * n + \text{PA2} * n^2$$

$$\text{Residual (\%FSR)} = (\text{computed pressure} - \text{true pressure}) * 100 / \text{Full Scale Range}$$

