

## **Supplement A. Environmental data of the sampling stations.**

Table A1. Environmental data for 23 stations from 6 cruises. Presented are the integrated averages for the euphotic zone.

Cruise	Station	Temperature (°C)	Salinity (psu)	PAR (μE/m <sup>2</sup> /s)	Nitrite (μM)	Nitrate (μM)	Phosphate (μM)	Silicate (μM)	Chlorophyll <i>a</i> (mg/m <sup>3</sup> )
May 2010	St. 1	18.97	28.34	5.50	1.05	7.00	0.45	14.70	0.66
May 2010	St. 5	21.82	33.29	762.00	0.56	1.20	0.26	2.60	0.68
May 2010	St. 9	23.11	34.56	813.50	0.15	5.20	0.43	6.50	0.56
Dec. 2010	St. 1	17.42	29.88	14.10	0.23	14.80	0.69	22.80	0.69
Dec. 2010	St. 5	20.50	33.06	0.10	0.16	4.90	0.37	10.40	0.51
Dec. 2010	St. 7	20.48	34.09	0.00	0.15	4.00	0.47	9.70	0.96
Dec. 2010	St. 9	24.71	34.56	163.30	0.09	3.60	0.40	8.60	0.40
Jun. 2011	St. 1	22.87	33.87	5.39	0.83	2.52	0.41	6.31	1.52
Jun. 2011	St. 2	23.24	34.08	24.40	0.74	2.08	0.39	3.94	1.12
Jun. 2011	St. 5	24.33	34.21	82.84	0.14	0.23	0.08	1.85	0.47

Aug. 2011	St. 1	24.52	34.08	6.23	0.90	1.58	0.33	7.76	1.29
Aug. 2011	St. 3	25.19	33.96	75.97	0.86	1.17	0.25	5.62	0.82
Aug. 2011	St. 5	26.95	33.77	5.62	0.28	0.52	0.12	6.24	0.23
Aug. 2011	St. 11	22.38	34.41	15.71	0.14	3.24	0.30	6.46	0.42
Jul. 2011	St. E_1	22.43	34.24	5.71	0.18	9.13	0.33	7.55	0.38
Jul. 2011	St. E_12	23.01	34.21	16.00	0.03	2.97	0.18	6.04	0.26
Jul. 2011	St. E_19A	19.15	30.52	12.41	0.46	22.34	0.85	27.15	1.49
Jul. 2011	St. E_29	21.16	32.96	0.04	0.24	10.17	0.51	15.44	1.53
Jul. 2011	St. E_30	20.48	33.47	0.03	0.28	12.71	0.97	20.13	2.55
Oct. 2011	St. E_1	20.63	34.46	11.95	0.39	0.08	4.33	0.42	7.83
Oct. 2011	St. E_24	22.45	34.19	0.01	0.79	0.09	3.32	0.47	7.77
Oct. 2011	St. E_29	20.73	33.14	0.01	1.52	0.47	14.30	1.44	32.05
Oct. 2011	St. E_30	21.95	30.85	1.58	11.56	0.99	13.51	0.98	18.05