

# APPENDIX

**Table A1. 2010 regional average temperature and salinity values for individual cruises that sampled within the eastern Gulf of Maine (boundaries defined in Figure 1.) Average values incorporating less than 10 observations are shown in gray.**

Gulf of Maine East													
Cruise	Surface							Bottom					
	CD	#obs	Temp	Anomaly	SDV1	SDV2	Flag	#obs	Temp	Anomaly	SDV1	SDV2	Flag
DEL1001	46	2	4.59	-0.45	0.69	5.75	1	2	6.48	0.10	0.64	7.05	1
HB1002	105	31	5.25	0.44	0.17	0.92	0	28	7.77	1.14	0.19	0.79	0
DEL1004	158	22	10.93	1.44	0.21	1.67	1	16	8.55	1.28	0.24	2.19	1
S11001	172	9	13.37	3.29	0.31	6.92	1	9	8.55	-1.90	0.30	7.32	1
DEL1009	234	19	16.74	1.74	0.25	1.40	0	14	9.05	0.71	0.27	1.86	0
DEL1010	263	35	16.18	0.57	0.17	1.24	1	35	8.81	0.96	0.16	2.24	1
DEL1011	301	26	12.82	-0.47	0.18	0.53	1	26	11.55	-1.39	0.18	1.85	1
HB1005	313	26	11.23	0.25	0.19	0.60	0	26	9.59	1.14	0.20	1.12	0
DEL1012	323	16	10.65	0.67	0.23	0.61	0	11	9.54	1.12	0.27	1.37	0

  

Cruise	Surface							Bottom					
	CD	#obs	Salinity	Anomaly	SDV1	SDV2	Flag	#obs	Salinity	Anomaly	SDV1	SDV2	Flag
DEL1001	46	2	32.55	-0.57	0.43	2.63	1	2	33.48	-0.20	0.41	3.01	1
HB1002	105	31	31.83	-0.69	0.12	0.42	0	28	33.99	0.00	0.10	0.45	0
DEL1004	158	22	32.00	-0.44	0.14	0.68	1	16	33.82	0.08	0.14	1.01	1
S11001	172	9	31.99	-0.79	0.18	1.30	1	9	32.46	-0.35	0.18	1.37	1
DEL1009	234	19	32.22	-0.15	0.19	0.34	0	14	34.23	-0.02	0.15	0.37	0
DEL1010	263	35	32.12	-0.24	0.11	0.79	1	35	34.50	0.16	0.10	0.79	1
DEL1011	301	26	32.22	-0.38	0.11	0.12	1	26	32.43	-0.20	0.11	0.21	1
HB1005	313	26	32.79	0.04	0.13	0.38	0	26	34.48	0.06	0.10	0.33	0
DEL1012	323	16	32.74	0.09	0.16	0.26	0	11	34.12	0.00	0.15	0.36	0

"Cruise", the code name for a cruise:  
 CD, the calendar mid-date of all the stations within a region for that cruise:  
 "#obs", the number of observations included in each average:  
 "Temp", the areal average temperature: "Salt", the areal average salinity:  
 Anomaly, the areal average temperature or salinity anomaly:  
 "SDV1", the standard deviation associated with the average temperature or salinity anomaly:  
 "SDV2", the standard deviation of the individual anomalies from which the average anomaly was derived:  
 Flag, a value of "1" indicates that a true areal average could not be calculated due to poor station coverage.  
 The areal averages listed were derived from a simple average of the observations within the region.

**Table A2. 2010 regional average temperature and salinity values for individual cruises that sampled within the western Gulf of Maine (boundaries defined in Figure 1.) Average values incorporating less than 10 observations are shown in gray.**

Gulf of Maine West													
Cruise	Surface							Bottom					
	CD	#obs	Temp	Anomaly	SDV1	SDV2	Flag	#obs	Temp	Anomaly	SDV1	SDV2	Flag
DEL1001	47	37	4.74	0.07	0.19	0.99	1	31	5.49	0.83	0.18	1.33	1
HB1002	113	56	7.04	1.56	0.15	0.93	0	55	6.11	1.01	0.13	0.69	0
DEL1004	158	27	13.36	2.49	0.19	0.90	0	48	6.93	1.10	0.19	1.67	1
S11001	178	13	16.06	3.06	0.31	4.63	1	13	6.96	0.70	0.28	4.86	1
DEL1009	234	23	18.40	1.60	0.22	1.53	0	21	7.59	1.22	0.19	1.20	0
DEL1010	280	82	14.33	0.53	0.12	0.69	1	79	8.09	1.84	0.10	1.32	1
HB1005	318	44	10.74	0.54	0.16	0.71	0	43	8.93	1.42	0.14	0.94	0
DEL1012	329	54	9.66	0.59	0.15	2.23	1	47	8.88	1.43	0.15	2.22	1

  

Cruise	Surface							Bottom					
	CD	#obs	Salinity	Anomaly	SDV1	SDV2	Flag	#obs	Salinity	Anomaly	SDV1	SDV2	Flag
DEL1001	47	37	32.57	-0.28	0.13	0.45	1	31	32.89	-0.30	0.11	0.56	1
HB1002	113	56	31.60	-0.87	0.10	0.41	0	55	33.04	-0.30	0.07	0.41	0
DEL1004	158	27	31.41	-0.64	0.12	0.40	0	48	33.27	-0.11	0.11	0.75	1
S11001	178	13	31.61	-0.42	0.18	0.87	1	13	32.38	-0.43	0.16	0.92	1
DEL1009	234	23	31.81	-0.17	0.14	0.34	0	21	33.42	0.09	0.12	0.37	0
DEL1010	280	80	32.21	-0.12	0.08	0.52	1	79	33.87	0.25	0.06	0.48	1
HB1005	318	44	32.81	0.05	0.11	0.32	0	43	33.74	0.14	0.08	0.29	0
DEL1012	329	54	32.76	0.00	0.10	0.88	1	47	33.45	0.12	0.08	0.79	1

"Cruise", the code name for a cruise:  
 CD, the calendar mid-date of all the stations within a region for that cruise:  
 "#obs", the number of observations included in each average:  
 "Temp", the areal average temperature: "Salt", the areal average salinity:  
 Anomaly, the areal average temperature or salinity anomaly:  
 "SDV1", the standard deviation associated with the average temperature or salinity anomaly:  
 "SDV2", the standard deviation of the individual anomalies from which the average anomaly was derived:  
 Flag, a value of "1" indicates that a true areal average could not be calculated due to poor station coverage.  
 The areal averages listed were derived from a simple average of the observations within the region.

**Table A3. 2010 regional average temperature and salinity values for individual cruises that sampled within the Georges Bank area (boundaries defined in Figure 1.) Average values incorporating less than 10 observations are shown in gray.**

Georges Bank													
Cruise	Surface							Bottom					
	CD	#obs	Temp	Anomaly	SDV1	SDV2	Flag	#obs	Temp	Anomaly	SDV1	SDV2	Flag
DEL1001	45	30	5.40	-0.16	0.21	0.60	0	27	5.82	-0.07	0.25	1.11	0
HB1002	98	58	6.81	1.67	0.14	1.42	0	46	6.60	1.43	0.16	0.93	0
DEL1004	154	42	10.96	1.27	0.16	0.90	0	28	8.65	0.71	0.22	1.10	0
S11001	167	49	12.13	1.51	0.17	1.72	0	46	9.15	0.87	0.18	1.94	0
DEL1009	241	41	18.73	2.54	0.18	1.48	0	36	12.53	0.24	0.17	1.88	1
DEL1010	269	19	15.67	0.63	0.21	0.69	1	18	12.05	-0.84	0.22	2.34	1
HB1005	298	56	13.97	-0.08	0.14	1.27	0	38	12.67	0.46	0.19	1.08	0
DEL1011	302	71	12.79	-0.43	0.11	0.27	1	71	12.20	-0.66	0.11	0.95	1
DEL1012	326	56	12.32	0.80	0.14	1.73	0	49	11.94	0.98	0.16	1.63	0

  

Cruise	Surface							Bottom					
	CD	#obs	Salinity	Anomaly	SDV1	SDV2	Flag	#obs	Salinity	Anomaly	SDV1	SDV2	Flag
DEL1001	45	30	32.94	-0.13	0.12	0.29	0	27	33.09	-0.13	0.15	0.43	0
HB1002	98	58	32.83	-0.17	0.08	0.75	0	46	32.91	-0.24	0.10	0.47	0
DEL1004	154	42	32.30	-0.55	0.10	0.27	0	28	32.52	-0.57	0.13	0.47	0
S11001	167	49	32.16	-0.58	0.10	0.33	0	46	32.64	-0.39	0.11	0.38	0
DEL1009	241	41	32.32	-0.32	0.11	0.43	0	36	32.51	-0.30	0.10	0.71	1
DEL1010	269	19	32.19	-0.35	0.13	0.12	1	18	32.61	-0.12	0.13	0.35	1
HB1005	298	56	32.41	-0.36	0.09	0.37	0	38	32.90	-0.21	0.11	0.42	0
DEL1011	302	71	32.25	-0.36	0.06	0.06	1	71	32.36	-0.27	0.06	0.11	1
DEL1012	326	56	33.04	0.20	0.09	0.68	0	49	33.24	0.23	0.09	0.60	0

"Cruise", the code name for a cruise:  
 CD, the calendar mid-date of all the stations within a region for that cruise:  
 "#obs", the number of observations included in each average:  
 "Temp", the areal average temperature: "Salt", the areal average salinity:  
 Anomaly, the areal average temperature or salinity anomaly:  
 "SDV1", the standard deviation associated with the average temperature or salinity anomaly:  
 "SDV2", the standard deviation of the individual anomalies from which the average anomaly was derived:  
 Flag, a value of "1" indicates that a true areal average could not be calculated due to poor station coverage.  
 The areal averages listed were derived from a simple average of the observations within the region.

**Table A4. 2010 regional average temperature and salinity values for individual cruises that sampled within the northern Middle Atlantic Bight (boundaries defined in Figure 1.) Average values incorporating less than 10 observations are shown in gray.**

Northern Mid Atlantic Bight													
Cruise	Surface							Bottom					
	CD	#obs	Temp	Anomaly	SDV1	SDV2	Flag	#obs	Temp	Anomaly	SDV1	SDV2	Flag
DEL1001	38	15	5.70	-0.39	0.32	1.52	1	13	6.52	0.19	0.34	1.89	1
HB1002	84	56	6.16	1.60	0.17	1.45	0	48	6.01	0.88	0.22	1.44	0
DEL1004	150	34	13.83	1.92	0.23	1.11	0	28	7.90	0.76	0.25	1.59	0
S11001	156	14	14.59	1.48	0.34	1.92	1	14	7.15	0.30	0.33	2.26	1
DEL1009	244	7	22.62	3.80	0.46	0.63	1	6	10.41	-0.94	0.50	1.08	1
HB1005	282	61	17.60	0.62	0.17	1.31	0	46	13.81	1.26	0.22	1.73	0
DEL1012	320	41	12.87	-0.20	0.23	0.84	0	36	12.64	-0.02	0.25	1.00	0

  

Cruise	Surface							Bottom					
	CD	#obs	Salinity	Anomaly	SDV1	SDV2	Flag	#obs	Salinity	Anomaly	SDV1	SDV2	Flag
DEL1001	38	15	33.02	-0.14	0.23	0.83	1	13	33.37	-0.11	0.20	0.77	1
HB1002	84	56	32.34	-0.54	0.11	2.44	0	48	32.85	-0.50	0.13	0.47	0
DEL1004	150	34	31.95	-0.49	0.15	0.29	0	28	32.65	-0.49	0.16	0.56	0
S11001	156	14	31.67	-0.46	0.22	0.83	1	14	32.72	-0.28	0.20	0.55	1
DEL1009	244	7	33.03	0.44	0.28	0.53	1	6	32.73	-0.37	0.31	0.41	1
HB1005	282	61	32.58	-0.17	0.11	0.65	0	46	33.00	-0.34	0.14	0.54	0
DEL1012	320	41	32.57	-0.39	0.15	0.36	0	36	32.94	-0.46	0.15	0.47	0

"Cruise", the code name for a cruise:  
 CD, the calendar mid-date of all the stations within a region for that cruise:  
 "#obs", the number of observations included in each average:  
 "Temp", the areal average temperature: "Salt", the areal average salinity:  
 Anomaly, the areal average temperature or salinity anomaly:  
 "SDV1", the standard deviation associated with the average temperature or salinity anomaly:  
 "SDV2", the standard deviation of the individual anomalies from which the average anomaly was derived:  
 Flag, a value of "1" indicates that a true areal average could not be calculated due to poor station coverage.  
 The areal averages listed were derived from a simple average of the observations within the region.

**Table A5. 2010 regional average temperature and salinity values for individual cruises that sampled within the southern Middle Atlantic Bight (boundaries defined in Figure 1.) Average values incorporating less than 10 observations are shown in gray.**

**Southern Mid Atlantic Bight**

Cruise	Surface							Bottom					
	CD	#obs	Temp	Anomaly	SDV1	SDV2	Flag	#obs	Temp	Anomaly	SDV1	SDV2	Flag
DEL1001	37	33	6.35	0.36	0.23	0.85	1	30	6.31	0.85	0.24	0.83	1
DEL1002	60	9	7.69	-0.07	0.42	0.87	1	2	5.69	-0.21	0.94	2.51	1
HB1002	68	96	5.59	-0.07	0.13	1.44	0	82	5.32	-0.33	0.16	1.32	0
S11001	136	52	12.66	0.16	0.18	0.75	1	51	6.99	-0.86	0.20	1.13	1
DEL1004	149	65	16.02	0.42	0.19	1.18	1	35	9.48	-0.45	0.23	1.65	1
HB1005	260	94	21.84	-0.04	0.13	1.11	0	80	14.78	0.62	0.16	1.95	0
DEL1012	312	43	14.89	-0.34	0.21	0.65	0	38	14.45	-0.03	0.22	0.93	1

  

Cruise	Surface							Bottom					
	CD	#obs	Salinity	Anomaly	SDV1	SDV2	Flag	#obs	Salinity	Anomaly	SDV1	SDV2	Flag
DEL1001	37	32	33.37	0.17	0.18	0.53	1	29	33.51	0.32	0.15	0.44	1
DEL1002	60	9	34.13	0.00	0.29	0.34	1	2	33.98	0.49	0.58	1.49	1
HB1002	68	96	32.81	-0.32	0.10	2.19	0	82	33.16	-0.30	0.10	0.53	0
S11001	136	51	31.63	-1.03	0.13	0.41	1	51	33.16	-0.46	0.12	0.25	1
DEL1004	149	65	31.46	-0.68	0.15	0.46	1	35	32.18	-0.87	0.14	0.36	1
HB1005	260	94	32.42	0.14	0.10	0.79	0	80	32.80	-0.46	0.10	0.71	0
DEL1012	312	43	32.51	-0.32	0.16	0.92	0	38	32.81	-0.25	0.14	0.57	1

"Cruise", the code name for a cruise:

CD, the calendar mid-date of all the stations within a region for that cruise:

"#obs", the number of observations included in each average:

"Temp", the areal average temperature: "Salt", the areal average salinity:

Anomaly, the areal average temperature or salinity anomaly:

"SDV1", the standard deviation associated with the average temperature or salinity anomaly:

"SDV2", the standard deviation of the individual anomalies from which the average anomaly was derived:

Flag, a value of "1" indicates that a true areal average could not be calculated due to poor station coverage.

The areal averages listed were derived from a simple average of the observations within the region.

**Table A6. 2010 temperature, salinity, and volume of the shelf water (SHW) in the Middle-Atlantic Bight North (MABN) and South (MABS) during 2010. The shelf water is defined as water within the upper 100 meters having salinity less than 34.**

CD	Temp	Temp. Anomaly	Salt	Salt Anomaly	SHW Temp	SHW T. Anom	SHW Salt	SHW S. Anom	SHW Volume	SHW Vol. Anomaly
<b>MABN</b>										
84	6.55	0.99	33.04	-0.30	5.78	1.29	32.72	-0.32	2107.10	29.67
150	9.55	0.09	32.62	-0.60	9.39	0.60	32.47	-0.38	2390.77	470.85
158	9.39	-0.61	32.37	-0.85	9.39	0.02	32.37	-0.46	2332.11	409.47
283	15.60	0.61	33.48	-0.18	15.39	0.85	32.65	-0.28	1660.85	192.26
323	12.76	-0.90	32.89	-0.84	12.51	-0.49	32.67	-0.38	2190.17	820.51
<b>MABS</b>										
37	7.93	-0.87	33.95	-0.22	5.37	-0.22	33.24	-0.02	1201.07	30.12
69	6.87	-1.06	33.64	-0.35	5.50	0.37	33.13	-0.25	2221.52	909.73
136	8.73	-1.31	32.66	-0.77	8.71	-0.80	32.62	-0.23	3793.67	1858.63
150	11.27	0.29	32.55	-0.79	10.98	0.43	32.17	-0.52	2565.02	500.58
260	16.68	0.25	33.43	-0.07	16.87	0.61	32.53	-0.39	2205.91	71.69
312	14.94	0.24	33.37	-0.57	14.79	-0.16	32.79	-0.26	2099.04	461.76