

Appendix B

Community Measures for Sampling Strata

Minimum, mean, and maximum community measure values for each stratum. Abundance and number of taxa are for 0.1-m² Van Veen grab samples. The Shannon-Wiener Diversity Index (Shannon) was calculated using log_e; therefore, the units are nats. Evenness is the ratio of the observed Shannon diversity to the maximum, given the same number of taxa (Pielou 1969). Dominance is the minimum number of species whose combined abundance is equal to 75% of the individuals in the sample (Swartz *et al.* 1986). The Mainland Shelf Benthic Response Index (BRI; Smith *et al.* 2001) and Benthic Line of Evidence (BLOE; Ranasinghe *et al.* 2009) are explained in Chapter 2. -: Not applicable in stratum.

Table B-1. Abundance, number of taxa, Shannon-Wiener index, evenness, and dominance.

Stratum	N	Abundance (0.1 m ²)			No. of Taxa (0.1 m ²)			Shannon (nats)			Evenness			Dominance		
		Min	Mean	Max	Min	Mean	Max	Min	Mean	Max	Min	Mean	Max	Min	Mean	Max
Embayments																
Estuaries	64	5	771.7	4,103	3	25.8	72	0.10	1.79	3.50	0.04	0.59	0.90	1	4.6	20
Marinas	44	3	588.3	3,392	3	42.4	131	1.10	2.57	3.47	0.42	0.72	0.88	3	8.5	18
Ports	46	50	476.0	2,242	20	51.5	131	1.65	2.88	4.23	0.45	0.75	0.94	3	12.5	40
Bays	38	96	797.8	9,166	27	56.4	103	1.82	3.00	4.28	0.50	0.75	0.93	4	14.1	46
Offshore																
Mainland Shelf - Inner	31	90	346.3	783	25	74.5	155	1.60	3.36	4.28	0.42	0.80	0.94	3	22.4	42
Mainland Shelf - Mid	32	79	393.2	1,159	30	98.5	153	2.82	3.83	4.32	0.72	0.84	0.93	13	31.3	48
Mainland Shelf - Outer	28	43	189.5	532	27	61.9	127	2.93	3.52	4.19	0.68	0.88	0.95	12	24.0	41
Channel Island Shelf	30	99	646.4	3,865	24	122.4	207	2.34	3.93	4.93	0.65	0.83	0.93	5	35.8	81
Upper Slope	34	13	70.4	258	9	26.1	69	1.71	2.72	3.83	0.62	0.86	0.96	4	11.3	28
Lower Slope	35	1	36.8	203	1	17.0	44	0.00	2.30	3.55	0.00	0.85	0.99	1	9.5	27

Table B-1. Shelf Benthic Response Index (BRI) and Embayment Benthic Line of Evidence (BLOE).

Stratum	N	Shelf BRI			Embayment BLOE		
		Min	Mean	Max	Min	Mean	Max
Embayments							
Estuaries	64	-	-	-	1.0	2.9	4.0
Marinas	44	-	-	-	1.0	2.3	4.0
Ports	46	-	-	-	1.0	2.0	3.0
Bays	38	-	-	-	1.0	1.7	3.0
Offshore							
Mainland Shelf - Inner	31	-1.5	20.2	29.1	-	-	-
Mainland Shelf - Mid	32	2.0	14.8	25.8	-	-	-
Mainland Shelf - Outer	28	-2.3	15.4	32.6	-	-	-
Channel Island Shelf	30	-2.8	11.5	24.3	-	-	-
Upper Slope	34	-	-	-	-	-	-
Lower Slope	35	-	-	-	-	-	-