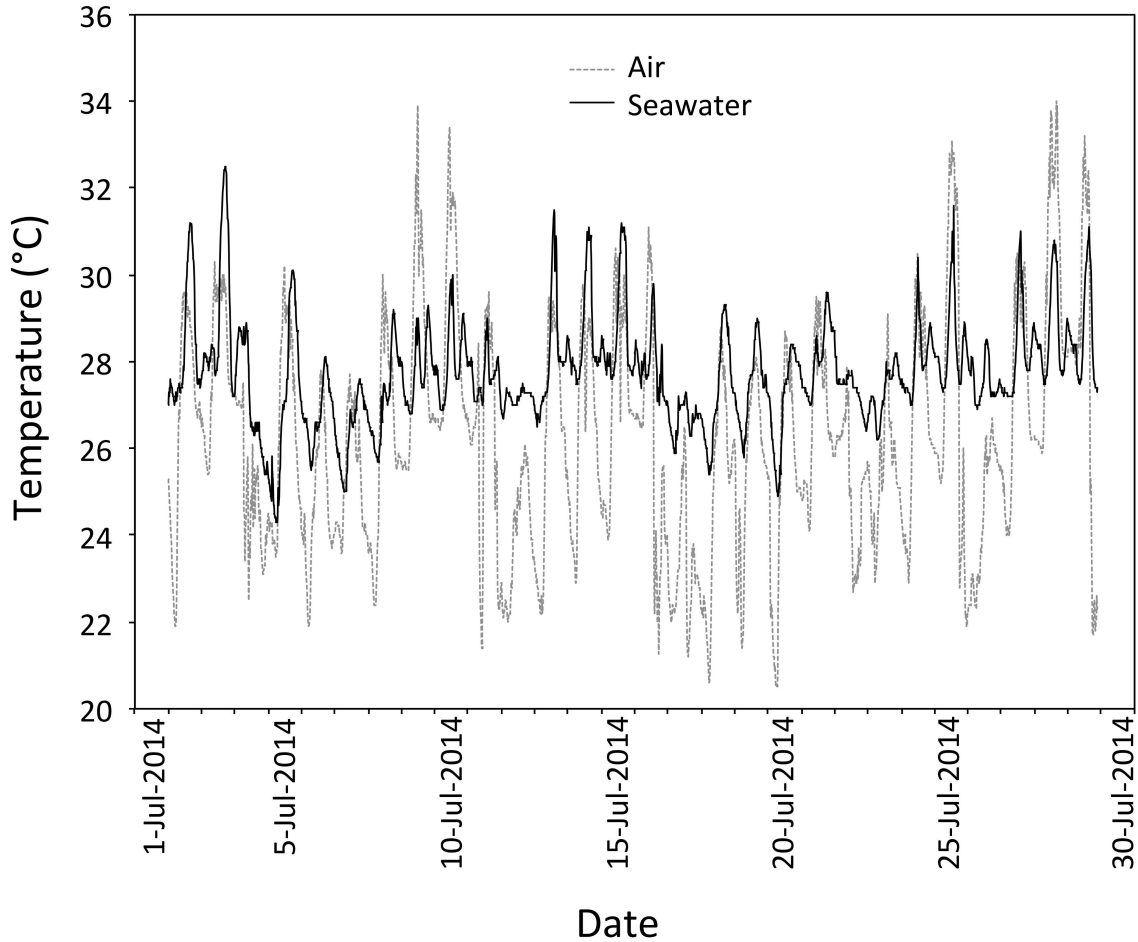


1 **SUPPLEMENTAL MATERIAL**

2

3 **Table S1.** Multiplex identifier (MID) sequence barcodes corresponding to samples in this
4 study, submitted to the NCBI Sequence Read Archive under the accession number
5 SRP065064.

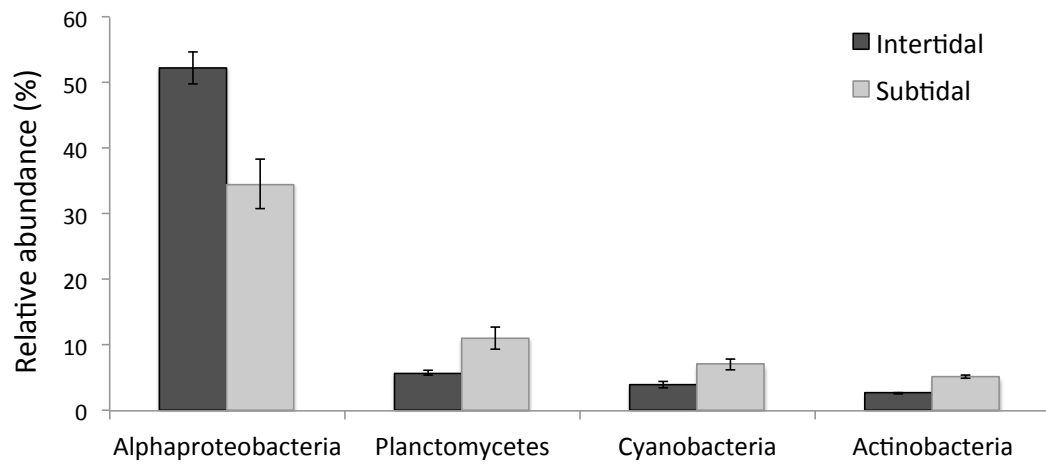
MID Sequence	Sample	Source
GAGTACTC	I1	Sponge (intertidal)
GAGTAGAC	I2	Sponge (intertidal)
GAGTAGTG	I3	Sponge (intertidal)
GAGTCACT	I4	Sponge (intertidal)
GAGTCAGA	I5	Sponge (intertidal)
GAGTCTCA	I6	Sponge (intertidal)
GAGAGTGT	S1	Sponge (subtidal)
GAGATCAG	S2	Sponge (subtidal)
GAGATCTC	S3	Sponge (subtidal)
GAGATGAC	S4	Sponge (subtidal)
GAGATGTG	S5	Sponge (subtidal)
GAGTACAG	S6	Sponge (subtidal)
GAGTGTCT	T1	Sediment
GAGTGTGA	T2	Sediment
GAGTTCAC	T3	Sediment
GAGTCTGT	W1	Seawater
GAGTGACA	W2	Seawater
GAGTGAGT	W3	Seawater



8

9

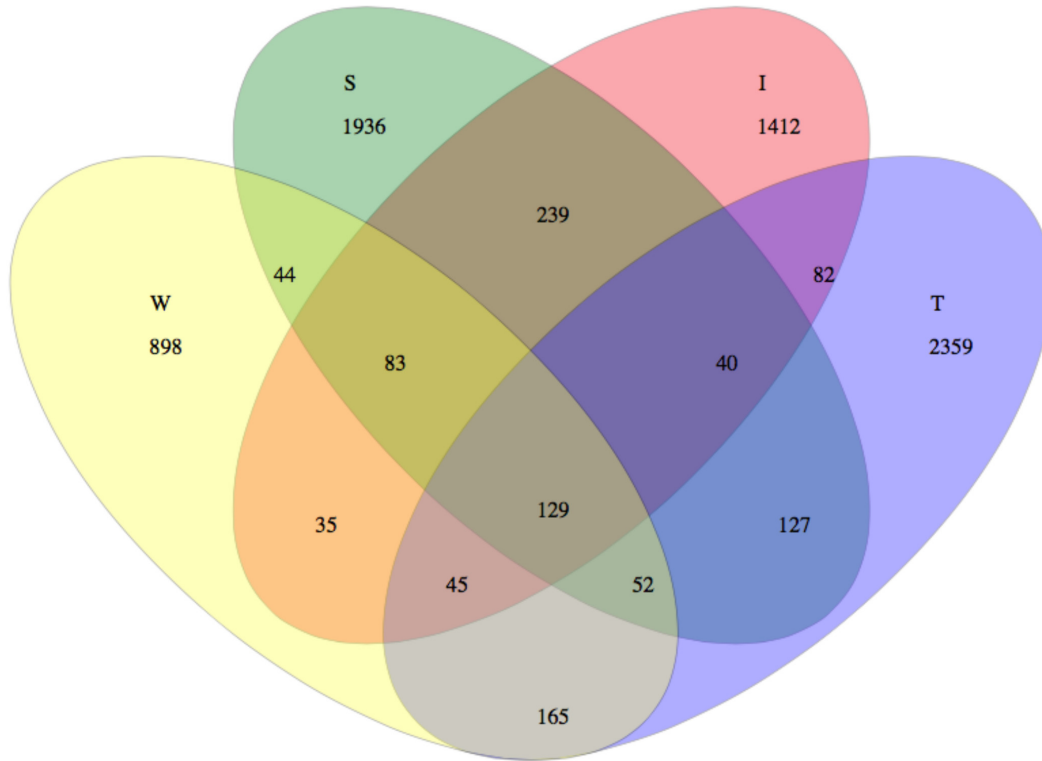
10 **Figure S1.** Air (*gray dotted line*) and seawater (*black solid line*) temperatures during the
 11 collection month (July 2014) recorded at 15 min intervals by monitoring stations at
 12 Research Creek (34.1555 N, -77.8509 W) and Loosin Creek (34.1722 N, -77.8328 W),
 13 respectively. Intertidal sponges are exposed periodically to the more variable and extreme
 14 air temperatures, while subtidal sponges occupy the more stable thermal regime of
 15 seawater.



16

17 **Figure S2.** Symbiont taxa exhibiting significant differences (t-test, $P < 0.05$) in relative

18 abundance between intertidal (*dark grey*) and subtidal (*light grey*) sponge hosts.



19

20 **Figure S3.** Venn diagram comparing the overlap in 97% microbial OTU richness among
 21 subtidal *H. heliophila* (S, green), intertidal *H. heliophila* (I, red), seawater (W, yellow),
 22 and sediment (T, blue). Total OTU species richness is 7,646 from all four environments.