

The following supplement accompanies the article

Ecosystem effects of materials proposed for thin-layer capping of contaminated sediments

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Supplement. Additional information regarding the sampling design and on the taxa observed in the experiment

Table S1. Time schedule and sampling activities for the experiment. \times : all replicates in all treatments were sampled; O: at least one partial sampling (usually one replicate per treatment) was made \times

Table S2. Mean (\pm SE) abundance of (a) macrofaunal (no. of ind. per box core), (b) meiofaunal (no. of ind. per 2 sampling cores) and (c) bacterial (relative peak area) taxa observed in the experiment. Note that in (b) no samples from FC were analysed, and in (c) a threshold value of 1% was used as the cut-off value for removal of analytical noise. FC: field control, CT: control, CS: suspended clay, CC: cut clay, SA: sand, HY: hyperite, AC: activated carbon, LG: Kraft-lignin, MC: coarse marble, MF: fine marble, PL: plaster, OTU: operational taxonomic unit, indet.: undetermined

Table S2. (continued)

Taxa	FC	CT	CS	CC	SA	HY	AC	LG	MC	MF	PL
Opistobranchia											
<i>Philine scabra</i>											
<i>Cylichna cylindracea</i>											
Bivalvia											
<i>Nucula sulcata</i>											
<i>Nuculoma tenuis</i>	1.3 ± 0.5	1.5 ± 0.3	1.8 ± 0.6	0.8 ± 0.3	2.3 ± 1.3	0.5 ± 0.5	2.8 ± 2.4	1.0 ± 0.6	0.3 ± 0.3	0.5 ± 0.3	
<i>Thyasira cf. sarsi</i>											
<i>Thyasira equalis</i>	15.3 ± 2.0	8.3 ± 3.4	3.5 ± 1.5	6.5 ± 4.0	11.5 ± 1.7	4.0 ± 1.8	5.8 ± 3.8	1.8 ± 0.8	1.5 ± 0.6		1.5 ± 1.0
<i>Thyasira flexuosa</i>			0.3 ± 0.3	0.5 ± 0.5							
<i>Thyasira sarsi</i>	0.8 ± 0.8			0.5 ± 0.5							
<i>Montacuta tenella</i>	1.8 ± 1.8	0.3 ± 0.3	1.5 ± 1.5		1.3 ± 0.8	0.3 ± 0.3	0.8 ± 0.8				
<i>Abra nitida</i>	0.3 ± 0.3	1.0 ± 0.7									
Cumacea											
<i>Eudorella emarginata</i>	3.3 ± 0.6	2.5 ± 0.9	0.8 ± 0.5			0.5 ± 0.3	4.0 ± 1.1				
<i>Leucon nasica</i>	10.0 ± 1.9	8.5 ± 5.4	6.5 ± 5.0	0.5 ± 0.3	0.3 ± 0.3		2.5 ± 1.7			3.8 ± 2.6	
<i>Diastyloides serrata</i>	0.5 ± 0.3	0.5 ± 0.5									
Amphipoda											
<i>Cheirocratus sundewallii</i>		1.0 ± 0.7									
<i>Eriopisa elongata</i>	1.0 ± 0.4	0.8 ± 0.8	1.3 ± 0.8	1.3 ± 0.9	2.0 ± 0.7		1.8 ± 1.2	0.5 ± 0.5	0.3 ± 0.3	1.0 ± 1.0	
<i>Arrhis phyllonyx</i>	0.3 ± 0.3				0.3 ± 0.3						
<i>Podocerus falcatus</i>				0.3 ± 0.3			0.3 ± 0.3				
Decapoda											
<i>Pandalina profunda</i>				0.3 ± 0.3	0.3 ± 0.3						
Ophiuroidea											
<i>Amphiura chiajei</i>		0.3 ± 0.3			0.3 ± 0.3					0.3 ± 0.3	
Echinoidea											
<i>Brissopsis lyra</i>	0.5 ± 0.5	0.5 ± 0.3	0.5 ± 0.3	0.3 ± 0.3	0.5 ± 0.3	0.3 ± 0.3	1.0 ± 0.4	0.5 ± 0.3			
<i>Echinocardium flavescentes</i>		1.5 ± 1.5			0.3 ± 0.3	0.8 ± 0.5					
Holothuroidea											
Holothuroidea, indet.		0.3 ± 0.3									
Pogonophora											
Pogonophora, indet.				1.3 ± 1.3							
Nemertinea											
Nemertinea, indet.	6.0 ± 2.3	16.3 ± 5.7	24.3 ± 10.5	5.0 ± 3.3	4.0 ± 0.9	33.8 ± 17.3	11.0 ± 6.6	10.3 ± 5.5	27.3 ± 8.2	9.0 ± 3.3	12.8 ± 3.6
Nematoda											
Nematoda, indet.		0.8 ± 0.8	0.3 ± 0.3	0.5 ± 0.3		0.3 ± 0.3		0.8 ± 0.5		0.8 ± 0.8	
Ostracoda											
<i>Philomedes globosus</i>	6.8 ± 4.8	4.5 ± 2.0	3.5 ± 1.2	1.8 ± 0.6	4.3 ± 1.5	2.5 ± 1.0	4.8 ± 2.5	1.5 ± 0.6	3.8 ± 1.7	0.5 ± 0.3	
<i>Conchoecia elegans</i>		0.3 ± 0.3									
Oligochaeta											
Oligochaeta, indet.						0.3 ± 0.3					
Sipunculida											
<i>Phascolion strombi</i>	0.3 ± 0.3	1.5 ± 0.5		0.3 ± 0.3	0.3 ± 0.3	0.3 ± 0.3		0.3 ± 0.3	0.3 ± 0.3		
Priapulida											
<i>Priapulus caudatus</i>	0.3 ± 0.3										
Varia											
Varia, indet.	0.5 ± 0.3	0.3 ± 0.3			0.3 ± 0.3	0.3 ± 0.3					
Vermiformis, indet.											
Taxa	FC	CT	CS	CC	SA	HY	AC	LG	MC	MF	PL
(b) Meiofauna											
Nematoda	1 606 ± 205	853 ± 273	1 070 ± 206	1 088 ± 171	1 069 ± 155	1 107 ± 403	935 ± 244	434 ± 99	210 ± 65	414 ± 59	
Oligochaeta	5.7 ± 2.9	3.3 ± 2.8	8.7 ± 4.1	14.0 ± 4.4	11.0 ± 5.2	11.0 ± 2.6	1.3 ± 0.9	0.3 ± 0.3		1.3 ± 0.7	
Polychaeta	29.7 ± 6.7	27.0 ± 4.0	7.3 ± 1.9	18.0 ± 6.0	20.3 ± 4.8	13.0 ± 6.4	2.3 ± 1.5	1.7 ± 1.2	2.3 ± 2.3	2.7 ± 1.2	

Table S2. (continued)

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Taxa	FC	CT	CS	CC	SA	HY	AC	LG	MC	MF	PL
223					0.015 ± 0.005						
295	0.013 ± 0.008	0.016 ± 0.009									
296		0.038 ± 0.019									
399										0.016 ± 0.009	
403									0.012 ± 0.012		
436										0.015 ± 0.009	
437		0.018 ± 0.006			0.028 ± 0.013					0.013 ± 0.004	
438					0.016 ± 0.016					0.046 ± 0.02	0.255 ± 0.051
439	0.04 ± 0.015	0.076 ± 0.027			0.045 ± 0.026			0.015 ± 0.015	0.127 ± 0.031	0.321 ± 0.114	0.03 ± 0.018
440		0.02 ± 0.02	0.017 ± 0.011		0.034 ± 0.019			0.037 ± 0.015	0.039 ± 0.039	0.089 ± 0.089	0.03 ± 0.017
441					0.042 ± 0.015					0.011 ± 0.006	
442					0.01 ± 0.01						
444						0.011 ± 0.011					
450	0.041 ± 0.019	0.108 ± 0.048			0.064 ± 0.028				0.099 ± 0.045		
451		0.044 ± 0.044	0.025 ± 0.017		0.023 ± 0.019				0.035 ± 0.021		
452										0.013 ± 0.013	
463	0.019 ± 0.008	0.042 ± 0.016			0.016 ± 0.006	0.012 ± 0.007					
465		0.014 ± 0.014									
470									0.022 ± 0.009		
485		0.028 ± 0.028									
489		0.022 ± 0.022									
490		0.014 ± 0.008	0.011 ± 0.004		0.017 ± 0.012						
492							0.036 ± 0.013				
493		0.021 ± 0.013									
494		0.023 ± 0.013			0.039 ± 0.023			0.019 ± 0.011	0.038 ± 0.017	0.049 ± 0.02	
495	0.078 ± 0.03	0.07 ± 0.023	0.062 ± 0.029	0.017 ± 0.017	0.017 ± 0.017	0.124 ± 0.096	0.205 ± 0.072	0.018 ± 0.018	0.022 ± 0.009		0.014 ± 0.009
497	0.011 ± 0.006	0.016 ± 0.016									0.01 ± 0.006
498	0.019 ± 0.019		0.011 ± 0.011	0.025 ± 0.011	0.019 ± 0.013	0.015 ± 0.015	0.041 ± 0.041				
499	0.066 ± 0.03	0.085 ± 0.029	0.033 ± 0.019			0.102 ± 0.041			0.013 ± 0.013		
500	0.022 ± 0.022	0.027 ± 0.027	0.012 ± 0.012	0.024 ± 0.011							