

## Supplementary materials

### SM1: Differences between soil types and between PCB congeners

Variables	Df	Sum sq	Mean sq	F value	Pr(>F)
Soil type	1	11203	11203	22.332	5.87 x 10 <sup>-5</sup> ***
PCB congeners	6	250838	41806	83.338	2 x 10 <sup>-16</sup> ***
Soil type x PCB congeners	6	8862	1477	2.944	0.0235 *
Residuals	28	14046	502		

**SM2.** Enzymatic activities in nmol g<sup>-1</sup> soil h<sup>-1</sup> in bioaugmented mesocosms (A) and in control mesocosms (B) after three months of treatment. The corresponding enzymes are BG :  $\beta$ -1,4-glucosidase, LAP : L-leucine aminopeptidase, NAG :  $\beta$ -1,4-N-acetylglucosaminidase, PHOS : Phosphatases, EEN : sum of NAG and LAP. EEN: extracellular enzymes of hydrolysis of N substrates; EEP: extracellular enzymes of hydrolysis of P substrates. Values are not significantly different (Welch test; p-value >0.05).

#### A

Enzymes	Control mesocosms	Bioaugmented mesocosms	p-value
BG	42.97 $\pm$ 7.16	61.37 $\pm$ 7.07	0.2097
LAP	773.86 $\pm$ 89.06	1082.37 $\pm$ 108.56	0.15
NAG	28.22 $\pm$ 8.67	30.01 $\pm$ 2.39	0.8838
EEP = PHOS	1183.42 $\pm$ 26.29	1016.49 $\pm$ 49.13	0.09039
EEN = LAP + NAG	802.08 $\pm$ 97.03	1112.38 $\pm$ 110.88	0.1619

#### B

Enzymes	Control mesocosms	Bioaugmented mesocosms	p-value
BG	54.50 $\pm$ 4.93	58.25 $\pm$ 1.06	0.6013
LAP	315.22 $\pm$ 33.59	294.94 $\pm$ 42.52	0.7759
NAG	25.28 $\pm$ 1.52	27.98 $\pm$ 1.01	0.3029
EEP = PHOS	412.32 $\pm$ 25.74	313.54 $\pm$ 19.81	0.07208
EEN = LAP + NAG	340.50 $\pm$ 34.85	322.91 $\pm$ 41.64	0.8049