

Table S4. General Linear Models of the influence of time, functional types and morphological features of water bodies, water properties on the variability of functional identity axes

		Func_PC1	Func_PC2	Func_PC3	Func_PC4	Species richness
Predictors		$F = 95.76,$ $P < 0.001,$ $R_{adj}^2 = 0.47$	$F = 47.45,$ $P < 0.001,$ $R_{adj}^2 = 0.30$	$F = 24.45,$ $P < 0.001,$ $R_{adj}^2 = 0.18$	$F = 29.90,$ $P < 0.001,$ $R_{adj}^2 = 0.18$	$F = 39.00,$ $P < 0.001,$ $R_{adj}^2 = 0.26$
Time*	VI	$1.64 \pm 0.14^*$	$-0.81 \pm 0.16^*$	$1.75 \pm 0.17^*$	-0.19 ± 0.17	$-1.70 \pm 0.16^*$
	VII	$1.14 \pm 0.20^*$	$-1.30 \pm 0.23^*$	$2.05 \pm 0.25^*$	$-0.54 \pm 0.25^*$	$-1.84 \pm 0.24^*$
	VIII	$0.68 \pm 0.21^*$	$-1.64 \pm 0.24^*$	$1.95 \pm 0.26^*$	-0.23 ± 0.26	$-1.85 \pm 0.25^*$
Type**	Artificial water body	$0.65 \pm 0.15^*$	0.10 ± 0.17	-0.14 ± 0.18	0.36 ± 0.18	$0.48 \pm 0.18^*$
	Bay	0.12 ± 0.08	-0.11 ± 0.09	$0.61 \pm 0.10^*$	-0.06 ± 0.10	0.01 ± 0.10
	Confluent lake	-0.22 ± 0.13	$0.41 \pm 0.15^*$	$0.46 \pm 0.17^*$	-0.15 ± 0.17	$0.42 \pm 0.16^*$
	Contrafluent-confluent lake	$0.24 \pm 0.05^*$	$0.21 \pm 0.05^*$	$0.14 \pm 0.06^*$	$-0.40 \pm 0.06^*$	$0.30 \pm 0.06^*$
	Contrafluent lake	$0.36 \pm 0.06^*$	$0.48 \pm 0.07^*$	$-0.34 \pm 0.08^*$	$-0.16 \pm 0.08^*$	$0.26 \pm 0.07^*$
	Isolated lake	0.08 ± 0.14	$1.61 \pm 0.17^*$	0.33 ± 0.18	$0.47 \pm 0.18^*$	$-1.23 \pm 0.17^*$
Water properties	Water temperature	$0.21 \pm 0.05^*$	$-0.19 \pm 0.06^*$	$-0.28 \pm 0.06^*$	$-0.12 \pm 0.06^*$	$0.19 \pm 0.06^*$
	Water transparency	$-0.09 \pm 0.03^*$	-0.01 ± 0.04	$0.24 \pm 0.04^*$	$0.20 \pm 0.04^*$	-0.05 ± 0.04
	Electrical conductivity	$0.95 \pm 0.04^*$	$-0.40 \pm 0.05^*$	$0.48 \pm 0.05^*$	-0.08 ± 0.05	$-0.55 \pm 0.05^*$
	Dissolved oxygen concentration	$-0.07 \pm 0.03^*$	$0.08 \pm 0.03^*$	0.01 ± 0.03	0.05 ± 0.03	0.02 ± 0.03
	Water pH	-0.01 ± 0.03	$-0.14 \pm 0.03^*$	$0.25 \pm 0.04^*$	$0.11 \pm 0.04^*$	$-0.24 \pm 0.03^*$
Morphology of the water bodies	Size of the reservoir (PC1)	$-0.16 \pm 0.02^*$	$-0.13 \pm 0.02^*$	$0.13 \pm 0.03^*$	$0.18 \pm 0.03^*$	$-0.34 \pm 0.02^*$
	Opposite dynamics of depth in relation to the shoreline complexity of the water bodies (PC2)	$0.06 \pm 0.02^*$	-0.03 ± 0.03	$0.10 \pm 0.03^*$	-0.04 ± 0.03	$0.16 \pm 0.03^*$
	Elongation of the reservoir (PC3)	$0.21 \pm 0.02^*$	$-0.10 \pm 0.02^*$	$-0.07 \pm 0.02^*$	$0.07 \pm 0.02^*$	0.03 ± 0.02

Note: * V month is a reference variable; ** Channel is a reference variable.