

**Effects of a treated sewage effluent on behavioural traits in *Diamesa cinerella* and  
*Daphnia magna***

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**CONTENT**

The **SUPPLEMENTARY MATERIAL** shows: Measured mean values for the swimming parameters on *Daphnia magna* (**Table S1**) and on *Diamesa cinerella*. larvae (**Table S2**) after 24 and 48 hours of exposure to control and to different dilutions of treated wastewater effluents, along with the measured standard deviations.

**Table S1.** Number of dead organisms, active time (%), average speed ( $\text{mm s}^{-1}$ ) and total distance moved (mm) measured in *Daphnia magna* after 24 hours and 48 hours of exposure.

Treatment	Dead		Active time			Average speed			Distance moved		
	N	M	SD	RSD	M	SD	RSD	M	SD	RSD	
<b>24 hours</b>											
<b>CTRL</b>	0	24.3	3.04	0.12	2.03	0.57	0.28	12.9	3.25	0.25	
<b>STP</b>	0	26.1	6.58	0.25	2.24	1.16	0.52	13.1	6.33	0.48	
<b>STP/10</b>	0	31.1	7.69	0.24	2.57	0.62	0.24	18.2	5.40	0.3	
<b>STP/100</b>	2	26.0	5.37	0.20	2.62	0.87	0.33	14.9	5.40	0.36	
<b>STP/1000</b>	3	27.5	5.55	0.2	1.96	0.58	0.3	11.8	4.09	0.35	
<b>48 hours</b>											
<b>CTRL</b>	0	24.6	11.3	0.46	1.71	0.77	0.45	10.32	5.28	0.51	
<b>STP</b>	0	31.7	11.4	0.36	1.64	0.61	0.37	11.10	4.49	0.40	
<b>STP/10</b>	1	15.6	5.32	0.34	2.48	0.67	0.27	9.63	4.37	0.45	
<b>STP/100</b>	3	17.10	5.18	0.30	1.77	0.46	0.26	7.32	2.44	0.33	
<b>STP/1000</b>	4	14.92	6.75	0.45	1.79	0.69	0.39	7.43	4.33	0.58	

N= number of dead organisms; M = Mean values, SD = standard deviation, RSD = relative standard deviation; CTRL = Control; STP = Sewage Treatment Plant effluent, STP/10, STP/100 and STP/1000 = serial dilutions of STP

**Table S2.** Number of dead organisms, body bend per second ( $\text{n s}^{-1}$ ), average speed ( $\text{mm s}^{-1}$ ) and total distance moved (mm) measured in *Diamesa cinerella* larvae after 24 hours and 48 hours of exposure.

Treatment	Dead		Body Bend per second			Average Speed			Distance Moved		
	N	M	SD	RSD	M	SD	RSD	M	SD	RSD	
<b>24 hours</b>											
<b>CTRL</b>	0	0.68	0.29	0.43	0.74	0.29	0.36	6.67	5.38	0.81	
<b>STP</b>	0	0.73	0.35	0.48	0.75	0.35	0.31	5.95	3.80	0.78	
<b>STP/10</b>	0	0.84	0.38	0.45	0.77	0.38	0.58	3.41	1.94	0.79	
<b>STP/100</b>	0	0.81	0.23	0.28	0.84	0.23	0.25	3.70	3.08	0.84	
<b>STP/1000</b>	1	0.76	0.31	0.41	0.58	0.31	0.19	2.56	1.31	0.51	
<b>48 hours</b>											
<b>CTRL</b>	0	0.67	0.36	0.54	0.85	0.21	0.25	8.70	5.36	0.62	
<b>STP</b>	0	0.63	0.37	0.59	0.78	0.32	0.41	8.69	6.29	0.72	
<b>STP/10</b>	0	0.91	0.53	0.58	0.79	0.39	0.49	4.67	2.76	0.59	
<b>STP/100</b>	0	0.65	0.19	0.29	0.84	0.17	0.2	4.86	2.77	0.57	
<b>STP/1000</b>	0	0.99	0.48	0.48	0.93	0.38	0.4	9.23	7.70	0.83	

N= number of dead organisms; M = Mean values, SD = standard deviation, RSD = relative standard deviation; CTRL = Control; STP = Sewage Treatment Plant effluent, STP/10, STP/100 and STP/1000 = serial dilutions of STP