



Figure S1: O-ring silicone concentrations of (A) naphthalene, (B) phenanthrene, (C) anthracene, (D) fluoranthene, (E) pyrene and (F) benzo(a)pyrene at the start and after 22 and 72 hours passive dosing in medium or water. Each value represents the mean concentration plus standard deviation from triplicate O-rings.

		<b>O-ring silicone concentration (mg L<sup>-1</sup>)</b>				
		Start	22 h medium	75 h medium	22 h water	75 h water
<b>Naphthalene</b>	<b>Mean</b>	<b>16861.8</b>	<b>13643.8</b>	<b>6564.5</b>	<b>13548.6</b>	<b>5780.3</b>
	STDEV	619.9	298.7	479.6	40.7	351.8
	C.V. %	3.7	2.2	7.3	0.3	6.1
<b>Phenanthrene</b>	<b>Mean</b>	<b>4870.2</b>	<b>4902.1</b>	<b>5093.5</b>	<b>5375.7</b>	<b>4960.2</b>
	STDEV	191.2	262.8	100.0	56.2	54.7
	C.V. %	3.9	5.4	2.0	1.0	1.1
<b>Anthracene</b>	<b>Mean</b>	<b>237.8</b>	<b>230.1</b>	<b>229.6</b>	<b>240.5</b>	<b>234.4</b>
	STDEV	4.5	5.6	1.7	3.6	5.0
	C.V. %	1.9	2.5	0.7	1.5	2.1
<b>Fluoranthene</b>	<b>Mean</b>	<b>2460.6</b>	<b>2381.3</b>	<b>2546.4</b>	<b>2539.5</b>	<b>2566.6</b>
	STDEV	20.3	82.5	103.2	32.6	64.0
	C.V. %	0.8	3.5	4.1	1.3	2.5
<b>Pyrene</b>	<b>Mean</b>	<b>1599.8</b>	<b>1474.3</b>	<b>1551.7</b>	<b>1556.0</b>	<b>1585.0</b>
	STDEV	148.4	38.9	31.8	21.2	50.4
	C.V. %	9.3	2.6	2.1	1.4	3.2
<b>Benzo(a)pyrene</b>	<b>Mean</b>	<b>199.6</b>	<b>195.6</b>	<b>195.1</b>	<b>203.3</b>	<b>206.8</b>
	STDEV	1.8	4.8	8.6	4.6	8.0
	C.V. %	0.9	2.4	4.4	2.2	3.9

Table S1: O-ring silicone concentrations of naphthalene, phenanthrene, anthracene, fluoranthene, pyrene and benzo(a)pyrene at the start and after 22 and 72 hours passive dosing in medium or water. The mean, standard deviation (STDEV) and coefficient of variation (C.V. %) are from triplicate O-rings.

	Final freely dissolved concentration ( $\mu\text{g L}^{-1}$ )		
	Replicate 1	Replicate 2	Mean
<b>Naphthalene</b>	11167.1	11397.8	<b>11282.4</b>
<b>Acenaphthene</b>	2315.6	2445.9	<b>2380.7</b>
<b>Flourene</b>	1360.1	1370.5	<b>1365.3</b>
<b>Phenanthrene</b>	1263.9	1209.1	<b>1236.5</b>
<b>Anthracene</b>	31.1	31.4	<b>31.2</b>
<b>Fluoranthene</b>	164.6	163.0	<b>163.8</b>
<b>Pyrene</b>	146.1	154.1	<b>150.1</b>
<b>Benzo(a)anthracene</b>	6.50	8.15	<b>7.33</b>
<b>Chrysene</b>	-	-	<b>-</b>
<b>Benzo(a)pyrene</b>	1.40	0.58	<b>0.99</b>

Table S2: Analysed final equilibrium freely dissolved PAH concentrations from the exposure confirmation study. After assay completion, the O-rings were cleaned and equilibrated overnight with 1 mL of MilliQ water in closed autosampler vials at 37°C, before analysing the final equilibrium freely dissolved water concentration using HPLC. The freely dissolved concentrations of chrysene were below detection limits.