

Table S-1 Summary of analytical results for the determination of 16 PAHs in ERS-4 (µg/kg)

No. of Labs PAHs	01	02	05	10	07		03	04	06	08	09	11	
	Method 1 SE/ SPE/ GC-MS	Method 2 PLE/SPE/GC- MS	Method 2 PLE/SPE/G C-MS	Method 2 PLE/SPE/GC- MS	Method 3 SE/ GC-MS	SD	Method 4 SE/ SPE/ HPLC	Method 4 SE/ SPE/ HPLC	Method 4 SE/ SPE/ HPLC	Method 5 PLE/SPE/ HPLC	Method 6 PLE/GPC/H PLC	Method7 PLE/GPC/U PLC	SD
Naphthalene	71.4(4.2)	34.0(11.8)	55.6(5.6)	27.7(10.4)	50.4(3.4)	17.5	74.0(4.2)	46.0(7.8)	56.3(4.3)	52.4(3.8)	35.4(10.3)	58.7(9.5)	13.0
Acenaphthylene	10.5(6.5)	6.76(9.3)	6.46(5.7)	9.84(9.4)	6.20(6.6)	2.1	-	10.2(10.0)	-	5.82(8.2)	-	11.9(11.7)	3.2
Acenaphthene	14.4(4.1)	10.3(5.0)	10.7(5.7)	12.2(8.2)	10.3(4.0)	1.8	13.5(5.7)	11.2(8.7)	6.00(10.1)	13.1(5.2)	12.2(5.9)	12.7(3.3)	2.8
Fluorene	31.3(1.5)	20.9(2.4)	21.4(2.3)	19.4(6.8)	27.6(8.1)	5.1	24.4(6.9)	28.8(10.2)	27.1(4.5)	21.8(6.0)	24.8(5.9)	22.4(2.2)	2.7
Phenanthrene	146.0(2.8)	143.9(6.7)	142.6(1.0)	150.8(3.9)	156.7(3.2)	5.8	144.6(1.3)	140.2(7.1)	152.4(5.7)	150.8(6.9)	176.8(4.6)	147.0(3.8)	12.9
Anthracene	22.6(4.2)	16.1(10.0)	14.3(2.3)	18.8(4.6)	19.6(5.7)	3.2	18.9(3.0)	15.6(9.7)	15.7(3.1)	25.3(4.9)	22.2(5.6)	16.0(2.0)	4.0
Fluoranthene	174.0(3.2)	152.6(4.1)	155.5(7.3)	165.0(2.5)	163.0(3.6)	8.4	171.5(1.8)	162.0(6.2)	181.0(2.9)	164.9(4.2)	184.3(4.9)	161.4(1.5)	9.9
Pyrene	140.7(2.5)	119.5(3.7)	111.1(2.2)	135.0(3.4)	134.8(3.1)	12.4	115.2(1.5)	141.7(5.7)	174.2(5.3)	132.1(6.3)	160.8(4.9)	126.3(4.1)	22.1
Benz[a]anthracene	61.6(5.3)	66.7(2.9)	72.7(4.1)	81.5(3.8)	86.4(5.6)	10.2	67.5(2.1)	67.9(7.3)	131.6*(4.0)	96.1(3.9)	93.6(3.9)	81.5(2.1)	13.6
Chrysene	-	-	-	-	-	-	84.2(1.6)	71.7(10.9)	76.0(4.4)	101.3(3.0)	93.8(7.5)	78.4(2.3)	11.3
Chrysene+Triphenylene	88.4(1.1)	81.0(4.2)	77.8(12.4)	116.2(3.9)	92.7(4.3)	15.2	-	-	-	-	-	-	-
Benzo[b]fluoranthene	91.6(1.7)	122.9(3.3)	119.5(5.9)	113.2(4.6)	90.2(4.9)	15.5	99.3(2.2)	110.0(6.3)	116.5(4.4)	124.6(6.8)	111.8(5.3)	160.0*(2.6)	9.3
Benzo[k]fluoranthene	51.6(1.7)	36.9(5.7)	45.8(1.0)	42.5(4.8)	45.1(5.5)	5.3	37.6(1.3)	33.3(9.8)	45.6(3.1)	36.3(5.4)	42.1(5.8)	43.2(2.1)	4.7
Benzo[a]pyrene	75.4(1.8)	75.9(4.0)	83.9(3.7)	82.4(5.1)	76.6(5.2)	4.0	64.1(1.8)	87.3(6.5)	78.6(4.8)	74.1(3.6)	72.3(5.3)	70.0(2.5)	7.9
Indeno[1,2,3-cd]pyrene	71.6(3.5)	75.9(6.9)	82.8(3.1)	72.8(6.2)	85.9(4.5)	6.3	68.1(2.1)	68.5(9.0)	79.1(6.3)	63.1(3.2)	73.0(4.6)	79.6(2.4)	6.6
Dibenz[a,h]anthracene	21.9(6.0)	15.0(3.4)	25.6(3.4)	24.3(6.3)	20.1(5.0)	4.2	15.1(10.1)	13.1(12.5)	20.5(10.5)	21.6(9.0)	18.2(7.6)	15.4(3.8)	3.3
Benzo[ghi]perylene	85.0(3.1)	80.5(8.7)	84.3(8.6)	82.7(7.6)	81.0(3.7)	2.0	75.9(1.7)	84.5(8.8)	79.8(7.1)	162.8*(3.2)	147.3*(5.9)	88.0(3.4)	5.3

“-” No reported data; “SD” Standard deviation among laboratories; “*” The data of removed outliers; “()” Relative standard deviation of each laboratories (% , n=6).