



Report of research no 2052/2018

Order from:	Unirubber Sp. z o.o. ul. Zielonka 17 59-940 Węgliniec				
Analysis no.:	2052_1_1	Number of samples:	1	Delivery date:	05.06.2018
Letter:	2018/TL-TL/0209	Order no.:	800.1.18.2104.8410.4		
Substance tested:	Page: 1		Number of pages: 2		

The Laboratory made analysis according to methods listed below:

Elution parameters

Parameter determined	No of document/norm	Status*
Zinc as Zn	PN-EN ISO 11885:2009	A
Cadium as Cd	PN-EN ISO 11885:2009	A
Lead as Pb	PN-EN ISO 11885:2009	A
Nickel as Ni	PN-EN ISO 11885:2009	A
Chrom jako Cr	PN-EN ISO 11885:2009	A
Arsenic as As	PN-EN ISO 11885:2009	A
Antimony as Sb	PN-EN ISO 11885:2009	A
Mercury as Hg	Pn-EN 1483:2007	A
Chlorides Cl ⁻	PN-EN ISO 10304-1:2009 + AC 2012	A
Fluorine as F ⁻	PN-EN ISO 10304-1:2009 + AC 2012	A
Sulfur as SO ₄ ²⁻	PN-EN ISO 10304-1:2009 + AC 2012	A
Σ PAH**	from calculations	B
Naphthalene	PN-EN ISO 17993:2005	A
Phenanthrene	PN-EN ISO 17993:2005	A
Anthracene	PN-EN ISO 17993:2005	A
Fluoranthene	PN-EN ISO 17993:2005	B
Chrysene	PN-EN ISO 17993:2005	B
Benzo(a)anthracene	PN-EN ISO 17993:2005	B
Benzo(b)fluoranthene	PN-EN ISO 17993:2005	A
Benzo(k)fluoranthene	PN-EN ISO 17993:2005	A
Benzo(a)pyrene	PN-EN ISO 17993:2005	A
Benzo(ghi)perylene	PN-EN ISO 17993:2005	A
Benzene	PN-ISO 11423-1:2002	A
Toluene	PN-ISO 11423-1:2002	A
Xylene	PN-ISO 11423-1:2002	A
Ethylbenzene	PN-ISO 11423-1:2002	A
Dissolved organic carbon DOC	PN-EN 1484:1999	A

* A - determination accredited

B - oznaczenie nie objęte zakresem akredytacji

The expanded uncertainty for the ratio k = 2 and confidence level of 95% at demand

The certificate and the current range of accreditation available at

http://www.energopomiar.com.pl/akredytacje/energopomiar_certyfikat_AB-550.pdf

The water extract was prepared in a ratio liquid / solid = 10 l / kg according to PN-EN 12457-4:2006

** Σ Polycyclic Aromatic Hydrocarbons (PAH): Naphtalene, Phenanthrene, Anthracene, Fluoranthene, Chrysene, Benzo(a)anthracene, Benzo(b)fluoranthene, Benzo(k)fluoranthene, Benzo(a)pyrene, Benzo(ghi)perylene

Gliwice, 18.06.2018

Report of research no 2052/2018

Completion date: 18.06.2018

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No of sample	Date of sampling	Sample description passed by the Orderer:
2052_1_1	-	Granulat EPDM z recyklingu

Parameter determined	Unit	Analysis no.:			
		2052_1_1			
Zinc as Zn	mg/dm ³	0,293			
Cadium as Cd	mg/dm ³	< 0,001			
Lead as Pb	mg/dm ³	0,019			
Nickel as Ni	mg/dm ³	< 0,001			
Chrom jako Cr	mg/dm ³	< 0,001			
Arsenic as As	mg/dm ³	< 0,01			
Antimony as Sb	mg/dm ³	< 0,005			
Mercury as Hg	mg/dm ³	0,00003			
Chlorides Cl ⁻	mg/dm ³	1,01			
Fluorine as F ⁻	mg/dm ³	< 0,20			
Sulfur as SO ₄ ²⁻	mg/dm ³	2,02			
Σ PAH**	mg/dm ³	0,086097			
Naphthalene	mg/dm ³	0,077044			
Phenanthrene	mg/dm ³	< 0,000005			
Anthracene	mg/dm ³	0,000028			
Fluoranthene	mg/dm ³	0,000549			
Chrysene	mg/dm ³	< 0,000005			
Benzo(a)anthracene	mg/dm ³	0,005788			
Benzo(b)fluoranthene	mg/dm ³	< 0,000005			
Benzo(k)fluoranthene	mg/dm ³	0,002418			
Benzo(a)pyrene	mg/dm ³	0,000270			
Benzo(ghi)perylene	mg/dm ³	< 0,000005			
Benzene	mg/dm ³	< 0,0001			
Toluene	mg/dm ³	< 0,0001			
Xylene	mg/dm ³	< 0,0001			
Ethylbenzene	mg/dm ³	< 0,0001			
Dissolved organic carbon DOC	mg/dm ³	63,7			

The analysis results refer exclusively to analysed sample

Without the Laboratory's written consent the protocol cannot be duplicated in any other way but entirely

- result out of the range accreditation



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 Centralnego Laboratorium

 mgr Katarzyna Wojnar
 Autoryzował