

Test Report

No.: 70.431.23.11119.01

Dated: 2023-03-28



Greater China

Applicant: POLYCONCEPT GBS
Address: 4/F., HONGQIAO RONGGUANG BLDG., 11 CHANGSHUN ROAD SHANGHAI, 200051, PR CHINA
Product Name: Sabia RPET fldb tt bag
Model No.: 12054101-WH/12054121-RD/12054153-RYL/12054155-NY/12054190-WBK
PO/Order No.: PO#657600/657557
Manufacturer: #11554
Factory Code: #12992
Country of Origin: CHINA
Country of Destination: EU
Receipt Date of Sample: 2023-03-17
Date of Testing: 2023-03-17 to 2023-03-28
Sample Submitted: The sample(s) was (were) submitted by applicant and identified.
Test Result: Refer to the data listed in following pages

Test Item	Conclusion
1. Extractable heavy metals content in Annex XVII, Item 72 of the REACH Regulation (EC) No 1907/2006 with its Amendments	Pass
2. Total Lead Content Requirement in Annex XVII, Item 63 of the REACH Regulation (EC) No 1907/2006 with its Amendments	Pass
3. Total Cadmium Content Requirement in Annex XVII, Item 23 of the REACH Regulation(EC) No 1907/2006 with its Amendments	Pass
4. Formaldehyde Content Requirement in Annex XVII, Item 72 of the REACH Regulation (EC) No 1907/2006 with its Amendments	Pass
5. Polycyclic Aromatic Hydrocarbons (PAHs) Content in Annex XVII item 50 of the REACH Regulation (EC) No 1907/2006 with its Amendments	Pass
6. 2-benzotriazol-2-yl-4,6-di-tert-butylphenol (UV-320), 2-(2H-benzotriazol-2-yl)-4,6-ditertpentylphenol (UV-328), 2,4-di-tert-butyl-6-(5-chlorobenzotriazol-2-yl)phenol (UV-327) and 2-(2H-benzotriazol-2-yl)-4-(tert-butyl)-6-(sec-butyl)phenol (UV-350) Content - in Substances of Very High Concern (SVHC) published by European Chemicals Agency (ECHA)	<0.1%(W/W)
7. Azocolourants Content Requirement in Annex XVII, Item 43 of the REACH Regulation(EC) No 1907/2006 with its Amendment	Pass
8. Azo Dyes Content Requirement in Annex XVII, Item 72 of the REACH Regulation (EC) No 1907/2006 with its Amendments	Pass
9. Dyestuff Content Requirement in Annex XVII, Item 72 of the REACH Regulation (EC) No 1907/2006 with its Amendments	Pass
10. Chlorotoluenes content in Annex XVII, Item 72 of the REACH Regulation (EC) No 1907/2006 with its Amendments	Pass
11. Quinoline Content Requirement in Annex XVII, Item 72 of the REACH Regulation(EC) No 1907/2006 with its Amendments	Pass



Test Item	Conclusion
12. Dimethylformamide, N,N-dimethylacetamide (DMAC), N-Methyl-2-pyrrolidone Content Requirement in Annex XVII, Item 72 of the REACH Regulation (EC) No 1907/2006 with its Amendments	Pass
13. Dibutylbis(pentane-2,4dionato-O,O')tin Content - in Substances of Very High Concern (SVHC) published by European Chemicals Agency (ECHA)	<0.1%(W/W)
14. 2-methylimidazole Content - in Substances of Very High Concern (SVHC) published by European Chemicals Agency (ECHA)	<0.1%(W/W)
15. Tris(4-nonylphenyl, branched and linear) phosphite (TNPP) with $\geq 0.1\%$ w/w of 4-nonylphenol, branched and linear (4-NP) Content - in Substances of Very High Concern (SVHC) published by European Chemicals Agency (ECHA)	<0.1%(W/W)

Remarks: 1. MDL = Method Detection Limit
 2. ND = Not Detected (<MDL)
 3. <= Less than
 4. 1 mg/kg = 1 ppm = 0.0001%

TÜV SÜD Certification and Testing (China) Co.,Ltd. Shanghai Branch
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Note:

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- The results relate only to the Items tested.
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- Disclaimer Measurement Uncertainty: Unless otherwise agreed upon, Pass or Fail verdicts are given based on the measured values without any considerations of measurement uncertainties. Please note, every test method has a measurement uncertainty which has been evaluated by the laboratory according to ISO/IEC 17025 requirements. By taking measurement uncertainties into account it might happen that measured values can neither be assessed as Pass nor as Fail.

Description of the Tested Subject

Sample	Description	Photo
001	Sabia RPET fldb tt bag	
002	Sabia RPET fldb tt bag	
003	Sabia RPET fldb tt bag	

Sample	Description	Photo
004	Sabia RPET fldb tt bag	
005	Sabia RPET fldb tt bag	

T. No	Sample	Description
T1	006	Dark blue fabric
T2	007	Black fabric
T3	008	Blue fabric
T4	009	Red fabric
T5	010	White fabric
T6	011	Black string
T7	012	White/black fabric, label
T8	013	Black plastic, buckle
T9	014	White label with black/white coating (inside label)

Test Results

1. Extractable heavy metals content in Annex XVII, Item 72 of the REACH Regulation (EC) No 1907/2006 with its Amendments

Test with reference to EN 16711-2:2015, determination by ICP-OES/ICP-MS.

Test Item	Limit [mg/kg]	MDL [mg/kg]	Result(s) [mg/kg]		
			006+007	008+009	010+011
Cadmium As (Cd)	1	0.1	<0.1	<0.1	<0.1
Arsenic As (As)	1	0.2	<0.2	<0.2	<0.2
Chromium VI (Cr VI)*	1	0.5	<0.5	<0.5	<0.5
Lead As (Pb)	1	0.2	<0.2	<0.2	<0.2
Conclusion			Pass	Pass	Pass

Remark: * = Chromium VI was determined by screening of chromium

2. Total Lead Content Requirement in Annex XVII, Item 63 of the REACH Regulation (EC) No 1907/2006 with its Amendments

Test with reference to in house method, determination by ICP-OES/ICP-MS.

Sample	Unit	MDL	Limit	Result(s)	Conclusion
006+007+008	mg/kg	10.0	500	<10.0	Pass
009+010+011	mg/kg	10.0	500	<10.0	Pass
012	mg/kg	10.0	500	14.9	Pass
013+014	mg/kg	10.0	500	<10.0	Pass

3. Total Cadmium Content Requirement in Annex XVII, Item 23 of the REACH Regulation(EC) No 1907/2006 with its Amendments

Test with reference to Acid digestion and EN 1122:2001 Method B, determination by ICP-OES/ICP-MS.

Sample	Unit	MDL	Limit	Result(s)	Conclusion
006+007+008	mg/kg	10	<100	<10.0	Pass
009+010+011	mg/kg	10	<100	<10.0	Pass
012	mg/kg	10	<100	<10.0	Pass
013+014	mg/kg	10	<100	<10.0	Pass

4. Formaldehyde Content Requirement in Annex XVII, Item 72 of the REACH Regulation (EC) No 1907/2006 with its Amendments

Test with reference to EN ISO 14184-1:2011, determination by UV-Vis.

Sample	Unit	MDL	Limit	Result(s)	Conclusion
006+007+008	mg/kg	16	<300	<16	Pass
009+010+011	mg/kg	16	<300	<16	Pass

5. Polycyclic Aromatic Hydrocarbons (PAHs) Content in Annex XVII item 50 of the REACH Regulation (EC) No 1907/2006 with its Amendments

Test with reference to AfPS GS 2019:01, determination by GC-MS.

Parameter	CAS No.	Unit	MDL	Limit	Result(s)	
					006+007+008	009+010+011
Benzo[b]fluoranthene (BbFA)	205-99-2	mg/kg	0.1	<1	ND	ND
Benzo[a]anthracene (BaA)	56-55-3	mg/kg	0.1	<1	ND	ND
Benzo[a]pyrene (BaP)	50-32-8	mg/kg	0.1	<1	ND	ND
Benzo[e]pyrene (BeP)	192-97-2	mg/kg	0.1	<1	ND	ND
Benzo[j]fluoranthene (BjFA)	205-82-3	mg/kg	0.1	<1	ND	ND
Benzo[k]fluoranthene (BkFA)	207-08-9	mg/kg	0.1	<1	ND	ND
Chrysene (CHR)	218-01-9	mg/kg	0.1	<1	ND	ND
Dibenzo[a,h]anthracene (DBA _h A)	53-70-3	mg/kg	0.1	<1	ND	ND
Conclusion					Pass	Pass

6. 2-benzotriazol-2-yl-4,6-di-tert-butylphenol (UV-320), 2-(2H-benzotriazol-2-yl)-4,6-ditertpentylphenol (UV-328), 2,4-di-tert-butyl-6-(5-chlorobenzotriazol-2-yl)phenol (UV-327) and 2-(2H-benzotriazol-2-yl)-4-(tert-butyl)-6-(sec-butyl)phenol (UV-350) Content - in Substances of Very High Concern (SVHC) published by European Chemicals Agency (ECHA)

Test with reference to in house method and determination by LC-MS.

Compound	CAS No.	Unit	MDL	Limit	Result(s) [%]
					006+007+008+009+010+011
2-benzotriazol-2-yl-4,6-di-tert-butylphenol (UV-320)	3846-71-7	%	0.01	<0.1	<0.01
2-(2H-benzotriazol-2-yl)-4,6-ditertpentylphenol (UV-328)	25973-55-1	%	0.01	<0.1	<0.01
2,4-di-tert-butyl-6-(5-chlorobenzotriazol-2-yl)phenol (UV-327)	3864-99-1	%	0.01	<0.1	<0.01
2-(2H-benzotriazol-2-yl)-4-(tert-butyl)-6-(sec-butyl)phenol (UV-350)	36437-37-3	%	0.01	<0.1	<0.01

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7. Azocolourants Content Requirement in Annex XVII, Item 43 of the REACH Regulation(EC) No 1907/2006 with its Amendment

Test with reference to EN ISO 14362-1:2017, determination by GC-MS/HPLC.

No.	Prohibited Amines	CAS No.	MDL [mg/kg]	Limit [mg/kg]	Result(s) [mg/kg]	
					006+007+008	009+010+011
1	4-aminobiphenyl	92-67-1	5.0	<30	<5.0	<5.0
2	Benzidine	92-87-5	5.0	<30	<5.0	<5.0
3	4-chloro-o-toluidine	95-69-2	5.0	<30	<5.0	<5.0
4	2-naphthylamine	91-59-8	5.0	<30	<5.0	<5.0
5	o-aminoazotoluene	97-56-3	5.0	<30	<5.0	<5.0
6	5-nitro-o-toluidine	99-55-8	5.0	<30	<5.0	<5.0
7	4-chloroaniline	106-47-8	5.0	<30	<5.0	<5.0
8	2,4-diaminoanisole	615-05-4	5.0	<30	<5.0	<5.0
9	4,4'-diaminodiphenylmethane	101-77-9	5.0	<30	<5.0	<5.0
10	3,3'-dichlorobenzidine	91-94-1	5.0	<30	<5.0	<5.0
11	3,3'-Dimethoxybenzidine	119-90-4	5.0	<30	<5.0	<5.0
12	3,3'-dimethylbenzidine	119-93-7	5.0	<30	<5.0	<5.0
13	4,4'-methylenedi-o-toluidine	838-88-0	5.0	<30	<5.0	<5.0
14	p-cresidine	120-71-8	5.0	<30	<5.0	<5.0
15	4,4'-methylene-bis-(2-chloro-aniline)	101-14-4	5.0	<30	<5.0	<5.0
16	4,4'-oxydianiline	101-80-4	5.0	<30	<5.0	<5.0
17	4,4'-thiodianiline	139-65-1	5.0	<30	<5.0	<5.0
18	o-toluidine	95-53-4	5.0	<30	<5.0	<5.0
19	2,4-toluenediamine	95-80-7	5.0	<30	<5.0	<5.0
20	2,4,5-trimethylaniline	137-17-7	5.0	<30	<5.0	<5.0
21	2-methoxyaniline	90-04-0	5.0	<30	<5.0	<5.0
22	2,4-xylidine	95-68-1	5.0	<30	<5.0	<5.0
23	2,6-xylidine	87-62-7	5.0	<30	<5.0	<5.0
24	4-aminoazobenzene	60-09-3	5.0	<30	<5.0	<5.0
Conclusion					Pass	Pass

Interpretation of test results:

- (1) In the case of the measured value per amine component ≤ 30 mg/kg and according to the analysis carried out, the azo colourants banned under the Annex XVII of Regulation (EC) No. 1907/2006, REACH are not detected in the article submitted.
- (2) Banned AZO dyes in accordance to REACH regulation (EC) No. 1907/2006 and Amendment No. 552/2009 Annex XVII Item 43 (formerly known as 2002/61/EC)

8. Azo Dyes Content Requirement in Annex XVII, Item 72 of the REACH Regulation (EC) No 1907/2006 with its Amendments

Test with reference to EN ISO 14362-1:2017, determination by GC-MS/HPLC.

No.	Prohibited Amines	CAS No.	MDL [mg/kg]	Limit [mg/kg]	Result(s) [mg/kg]	
					006+007+008	009+010+011
1	4-Chloro-o-toluidinium chloride	3165-93-3	5.0	<30	<5.0	<5.0
2	2-Naphthylammoniumacetate	553-00-4	5.0	<30	<5.0	<5.0
3	4-Methoxy-m-phenylene diammonium sulphate	39156-41-7	5.0	<30	<5.0	<5.0
4	2,4,5-Trimethylaniline hydrochloride	21436-97-5	5.0	<30	<5.0	<5.0
Conclusion					Pass	Pass

9. Dyestuff Content Requirement in Annex XVII, Item 72 of the REACH Regulation (EC) No 1907/2006 with its Amendments

Test with reference to DIN 54231:2022, determination by LC-MS.

Compounds	CAS No	Unit	MDL	Limit	Results	
					006+007+008	009+010+011
C.I. Basic Red 9	569-61-9	mg/kg	7.5	<50	<7.5	<7.5
C.I. Disperse Blue 1	2475-45-8	mg/kg	7.5	<50	<7.5	<7.5
Basic Violet 3	548-62-9	mg/kg	7.5	<50	<7.5	<7.5
Conclusion					Pass	Pass

10. Chlorotoluenes content in Annex XVII, Item 72 of the REACH Regulation (EC) No 1907/2006 with its Amendments

Test with reference to DIN 54232:2010, determination by GC-MS.

Compound	CAS No.	Unit	MDL	Limit	Result
					006+007+008
p-Chlorobenzotrichloride	5216-25-1	ppm	0.1	<1	<0.1
Benzotrichloride	98-07-7	ppm	0.1	<1	<0.1
BenzylChloride	100-44-7	ppm	0.1	<1	<0.1
Conclusion					Pass

Compound	CAS No.	Unit	MDL	Limit	Result
					009+010+011
p-Chlorobenzotrichloride	5216-25-1	ppm	0.1	<1	<0.1
Benzotrichloride	98-07-7	ppm	0.1	<1	<0.1
BenzylChloride	100-44-7	ppm	0.1	<1	<0.1
Conclusion					Pass

11. Quinoline Content Requirement in Annex XVII, Item 72 of the REACH Regulation(EC) No 1907/2006 with its Amendments

Test with reference to DIN 54231:2022, determination by LC-MS.

Compound	CAS No.	Unit	MDL	Limit	Result
					006+007+008
Quinoline	91-22-5	mg/kg	10	<50	<10
Conclusion					Pass

Compound	CAS No.	Unit	MDL	Limit	Result
					009+010+011
Quinoline	91-22-5	mg/kg	10	<50	<10
Conclusion					Pass

12. Dimethylformamide, N,N-dimethylacetamide (DMAC), N-Methyl-2-pyrrolidone Content Requirement in Annex XVII, Item 72 of the REACH Regulation (EC) No 1907/2006 with its Amendments

Test with reference to DIN CEN ISO/TS 16189:2013, determination by GC-MS.

Compound	CAS No.	Unit	MDL	Limit	Result
					006+007+008
Dimethylformamide	68-12-2	mg/kg	10	<3000	13
N,N-dimethylacetamide (DMAC)	127-19-5	mg/kg	10	<3000	<10
N-Methyl-2-pyrrolidone	--	mg/kg	10	<3000	<10
Conclusion					Pass

Compound	CAS No.	Unit	MDL	Limit	Result
					009+010+011
Dimethylformamide	68-12-2	mg/kg	10	<3000	<10
N,N-dimethylacetamide (DMAC)	127-19-5	mg/kg	10	<3000	<10
N-Methyl-2-pyrrolidone	--	mg/kg	10	<3000	<10
Conclusion					Pass

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13. Dibutylbis(pentane-2,4dionato-O,O')tin Content - in Substances of Very High Concern (SVHC) published by European Chemicals Agency (ECHA)

Test with reference to in house method and determination by LC-MS.

Tested Items	CAS No.	MDL [% w/w]	Limit	Concentration [% w/w]
				006+007+008+009+010+011
Dibutylbis(pentane-2,4dionato-O,O')tin	22673-19-4 (245-152-0)	0.01	<0.1	<0.01

14. 2-methylimidazole Content - in Substances of Very High Concern (SVHC) published by European Chemicals Agency (ECHA)

Test with reference to in house method and determination by LC-MS.

Tested Items	CAS No.	MDL [% w/w]	Limit	Concentration [% w/w]
				006+007+008+009+010+011
2-methylimidazole	693-98-1	0.01	<0.1	<0.01

15. Tris(4-nonylphenyl, branched and linear) phosphite (TNPP) with $\geq 0.1\%$ w/w of 4-nonylphenol, branched and linear (4-NP) Content - in Substances of Very High Concern (SVHC) published by European Chemicals Agency (ECHA)

Test with reference to in house method and determination by LC-MS.

Tested Items	CAS No.	MDL [% w/w]	Limit	Concentration [% w/w]
				006+007+008+009+010+011
Tris(4-nonylphenyl, branched and linear) phosphite (TNPP) with $\geq 0.1\%$ w/w of 4-nonylphenol, branched and linear (4-NP)	--	0.01	<0.1	<0.01

- End of Test Report -