PPROVAL SHEET

Customer :

제품명(PRODUCT NAME)	제품번호(PART NUMBER)
FUSE HOLDER(20MM)	GF-205B20
FUSE HOLDER(22MM)	GF-205B22
FUSE HOLDER COVER	GF-205C

PLANNED : M. SA

CHECKED : D.S.CHOI

APPROVED : J.H.GOO

Note :

GEO YOUNG IND.Co.,LTD
#520-6, HYO SUNG 2-DONG,GYE YANG GU, INCHEON CITY, KOREA.
TEL)032-552-7130 FAX)032-552-7144
HOME PAGE) www.gyc.co.kr www.geoyoung.com

GEOYOUNG

Connector

Geo Young Ind.Co.,LTD

520-6, HYO SUNG 2-DONG, GYE YANG GU, INCHEON CITY, KOREA

T)032-552-7130 F)032-552-7144

〔1. 적용범위 (SCOPE)〕

20.0~22.0 mmPITCH FUSE HOLDER 에 대하여 규정한다.

(THIS SPECIFICATION COVERS THE 20.0~22.0 mm PICTH FUSE HOLDER SERIES.)

〔2. 제품명 및 제품번호 (PRODUCT NAME AND PART NUMBER)〕

제품명(PRODUCT NAME)	제품번호(PART NUMBER)	재 질 (MATERIAL)
GF-205B20	20 mm	NY66(Black)//(c2680)
GF-205B22	22 mm	NY66(Black)//(c2680)
GF-205C	COVER	NY66

*: 도면참조 (REFER TO THE DRAWING)

〔3. 정격 및 사용 WIRE (RATINGS AND APPLICABLE WIRES)〕

* 통전에 의한 온도상승분 포함.(INCLUDING TERMINAL TEMPERATURE RISE.)

항 목 (ITEM)	규 격 (STANDARD)
최대허용전압 〔RATED VOLTAGE (MAX.)〕	250V
최대허용 전류 및 사용 WIRE (RATED CURRENT (MAX.)AND APPLICABLE WIRES.)	10A
사용온도범위 (AMBIENT TEMPERATURE RANGE)	-25℃ ~+85℃ *

Geo Young Ind.Co.,LTD
520-6, HYO SUNG 2-DONG, GYE YANG GU, INCHEON CITY, KOREA
T)032-552-7130 F)032-552-7144

[4. 성 능 (PERFORMANCE)]

4.1 전기적(ELECTRICAL PERFORMANCE)

항 목 (ITEM)		조 건 (TEST CONDITION)	규 격 (REQUIREMENT)
4.1.1	접촉저항	결합된 CONNECTOR를 개방전압 DC 50mV 이하, 단락 전류 50mA에서 측정한다. (JIS C5402 5.4)	20mΩMAX.
	CONTACT RESISTANCE	MATED CONNECTOR를 인접 TERMINAL BY DRY CIRCUIT,DC50mV MAX. 50mA.(BASED UPON JIS C5402 5.4)	
4.1.2	절연저항	결합된 CONNECTOR를 인접 TERMINAL 사이 및 TERMINAL과 GROUND간에 DC 500V를 인가하여 측정한다. (JIS C5402/MIL-STD-202 시험법 302 조건)	1000MΩ MIN.
	INSULATION RESISTANCE	MATED CONNECTORS, APPLY 500V DC BETWEEN ADJACENT TERMINAL OR GROUND. (BASED UPON JIS C5402 5.2/MIL-STD-202 METHOD 302 COND.B)	

4.2 환경적 성능과 기타성능 (ENVIRONMENTAL PERFORMANCE AND OTHERS)

항 목 (ITEM)		조 건 (TEST CONDITION)	규 격(REQUIREMENT)	
4.2.1	온도상승	FUSE HOLDER 를 최대허용전류를 통전하고 CONNECTOR 의 온도상승분을 측정한다. (UL 498)	30℃ MAX.	
	TEMPERATURE RISE	CARRYING RATED CURRENT LOAD. (BASED UPON UL 498)		
4.2.2	내진동수	진 폭 : 1.5mm P-P 진동수 : 10-55-10 Hz/분 진동시간 : X.Y.Z 축 각 2시간 (MIL-STD-202 시험법 201A)	외 관	이상 없을것
			접촉저항	20mΩ MAX.
			순간단락	1u sec. MAX
	VIBRATION	AMPLITUDE:1.5mm P-P SWEEP TIME:10-55-10 Hz IN 1 MINUTE. DURATION : 2 HOURS IN EACH X.Y.Z AXES. (BASED UPON MIL-STD-202 METHOD 201A)	APPEARANCE	NO DAMAGE
			CONTACT RESISTANCE	20mΩ MAX.
			DIS-CONTINUTY	1u sec. MAX

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항 목 (ITEM)		조 건 (TEST CONDITION)	규 격(REQUIREMENT)	
4.2.3	내충격수	50G의 충격을 각 X.Y.Z 축에 3회 가한다. (JIS C0041/MIL-STD-202 시험법 213B 조건 A.)	외 관	이상 없을것
			접촉저항	20mΩ MAX.
			순기단락	1u sec. MAX
	SHOCK	50G, 3 STROKES IN EACH X.Y.Z AXES. (BASED UPON JIS C0041/MIL-STD-202 METHOD 213B COND.A)	APPEARANCE	NO DAMAGE
			CONTACT RESISTANCE	20mΩ MAX.
			DIS-CONTINUTY	1u sec. MAX
4.2.4	내열성	결합된 CONNECTOR를 85±2℃에서 96시간방치.(JIS C0020/MIL-STD-202 시험법 108A 조건 A.)	외 관	이상 없을것
			접촉저항	20mΩ MAX.
	HEAT RESISTANCE	85±2℃, 96 HOURS. (BASED UPON JIS C0021/MIL-STD-202 METHOD 108A COND.A)	APPEARANCE	NO DAMAGE
			CONTACT RESISTANCE	20mΩ MAX.
4.2.5	내한성	결합된 CONNECTOR를 -40±3℃에서 96시간 방치 (JIS C0020)	외 관	이상 없을것
			접촉저항	20mΩ MAX.
	COLD RESISTANCE	-40±3℃, 96 HOURS. (BASED UPON JIS C0020)	APPEARANCE	NO DAMAGE
			CONTACT RESISTANCE	20mΩ MAX.
4.2.6	내습성	온 도 : 40±2℃ 상대습도 : 90~95% 지속시간 : 96 HOURS. (JIS C0020/MIL-STD-202 시험법 103A 조건 B.)	외 관	이상 없을것
			접촉저항	20mΩ MAX.
			내 전 압	4.1.3 만족할것.
			절연저항	1000MΩ MIN.
	HUMIDITY	TEMPERATURE :40±2℃ RELATIVE HUMIDITY : 90~95% DURATION : 96 HOURS. (BASED UPON JIS C0021/MIL-STD-202 METHOD 108A COND.B)	APPEARANCE	NO DAMAGE
			CONTACT RESISTANCE	20mΩ MAX.
			DIELECTRIC STRENGTH	MUST MEET 4.1.3
			INSULATION RESISTANCE	1000MΩ MIN.
4.2.7	온도싸이클	5 CYCLES: a) -40℃ 30분 b) +85℃ 30분 (JIS C0025)	외 관	이상 없을것
			접촉저항	20mΩ MAX.
	TEMPERATURE CYCLES	5 CYCLES: a) -40℃ 30 MINUTES b) +105℃ 30 MINUTES (BASED UPON JIS C0025)	APPEARANCE	NO DAMAGE
			CONTACT RESISTANCE	20mΩ MAX.

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항 목 (ITEM)		조 건 (TEST CONDITION)	규 격(REQUIREMENT)	
4.2.8	염수분무	결합된 CONNECTOR를 35±2℃에서 5±1% 중량비의 염수를 48±1시간 분무하고 시험 후 상온에서 물로 씻은 후 실온에서 건조시킨 후 전기적 성능측정. (JIS C5028/MIL-STD-202 시험법101D 조건B)	외 관	이상 없을것
			접촉저항	20mΩ MAX.
			절연저항	1000mΩMin
	SALT SPRAY	48±1 HOURS EXPOSURE TO A SALT SPRAY FROM THE 5±1% SOLUTION AT 35±2℃. (BASED UPON JIS C5028/MIL-STD-202 METHOD 101D COND.B)	APPEARANCE	NO DAMAGE
			CONTACT RESISTANCE	20mΩ MAX.
			Insulation Resistance	1000mΩMin
4.2.9	아황산가스	결합된 CONNECTOR를 40±2℃의 온도에서 50±5PPM의 아황산가스에 24시간 방치한다.	외 관	이상 없을것
			접촉저항	20mΩ MAX.
	So_2 GAS	24 HOURS EXPOSURE TO 50±5PPM. So_2 GAS AT 40±2℃.	APPEARANCE	NO DAMAGE
			CONTACT RESISTANCE	20mΩ MAX.
4.2.10	납땜성	납땜시간 : 10~15±0.5 sec. 납땜온도 : 230±5℃	침적면적 75% 이상	
	SOLDERABI-LITY	SOLDERING TIME :10~15±0.5 SEC. SOLDER TEMPERATURE : 230±5℃	75% OF IMMERSED AREA MUST SHOW NO VOIDS, PIN HOLES.	
4.2.11	납땜 내열성	납땜시간 : 5±0.5 SEC. 납땜온도 : 260±5℃	이상 없을 것.	
	RESISTANCE TO SOLDERING HEAT	SOLDERING TIME :5±0.5 SEC. SOLDER TEMPERATURE : 260±5℃	NO DAMAGE	

[5. 외관형상 칫수 및 재질 (PRODUCT SHAPE, DIMENSIONS AND MATERIALS)]

도면참조 (REFER TO THE DRAWING)

[6. 규격표기 (ORDERING INFORMATION)]

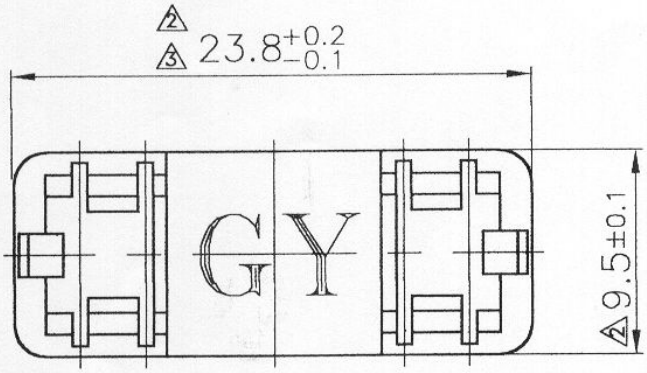
GF - 205B - 20 / 22

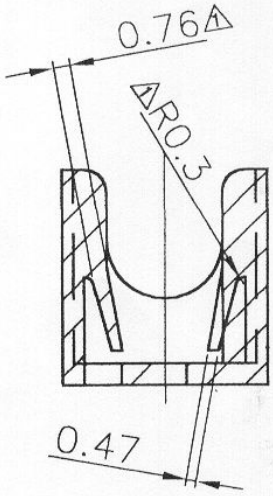
GF - 205C

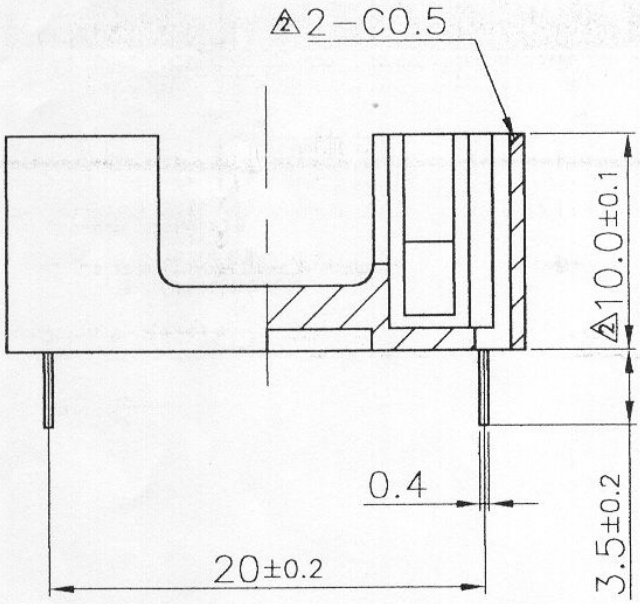
series fuse size pitch

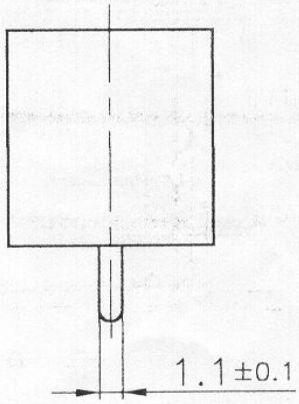
C-(cover)

REV No.	REVISION NOTE	DATE	DESIGNED	CHECKED	CHECKED	APPROVED
1	단자 삽입시 락장치 보안 0.47에서 0.80으로 수리 및 R0.3 수리.	01.11.7				
2	TERMINAL 삽입부 C0.5 수정.현품에 맞춰서 도면 수정.	01.12.20				
3	23.8 ± 0.1에서 +0.2,-0.1로 수정.	02.01.11				









원본 2002. 1. 1 거영산업

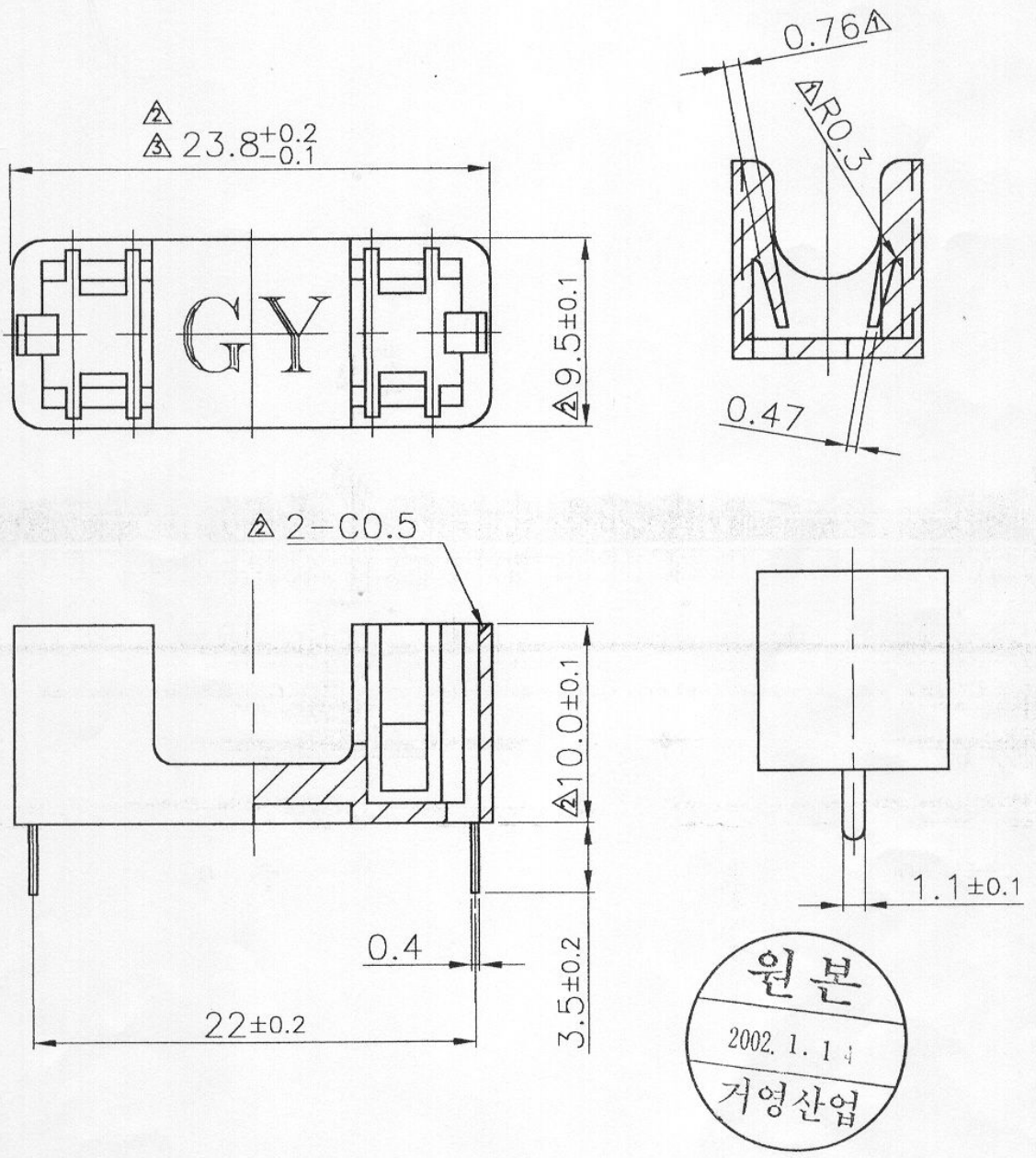
No.	DESCRIPTION	MATERIAL	Q'ty	TREATMENT	REMARKs
2	GF205T(20)	BRASS(SN)		동(CU)하지 2~3Um 석(SN) 3~5Um ± 0.1Um광택 도금	
1	WAFER	Nylon66		BLACK	

ITEM NAME	GF205B(20)	DWG NAME	GF205B(20)	SCALE	1 / 1
MODEL	STANDARD	DWG No.	STD01-054	DATE	2002.01.11
DESIGNED / CHECKED / CHECKED / APPROVED		FILE No.	FIT-STD01-054	GEO YOUNG	
		수 주 처	STANDARD		

QS-051-002(1) A4, A3

거영산업(주)

REV No.	REVISION NOTE	DATE	DESIGNED	CHECKED	CHECKED	APPROVED
1	단자 삽입시 락장치 보안 0.47에서 0.80으로 수리 및 R0.3 수리.	01.11.7				
2	TERMINAL 삽입부 C0.5 수정.현품에 맞춰서 도면 수정.	01.12.20				
3	23.8 ± 0.1에서 +0.2,-0.1로 수정	02.01.11				



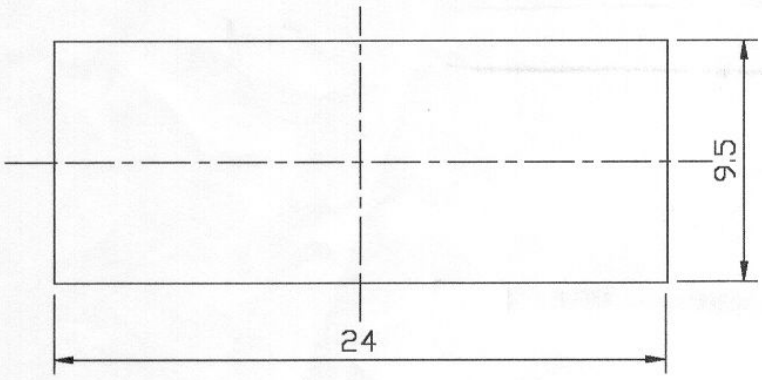
원본
2002. 1. 14
거영산업

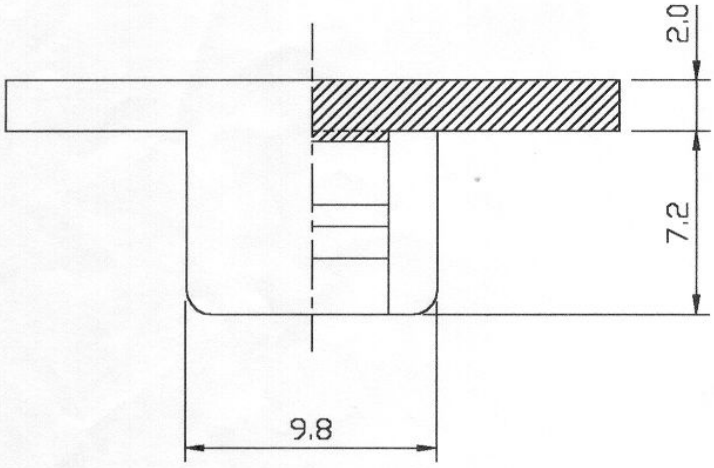
No.	DESCRIPTION	MATERIAL	Q'ty	TREATMENT	REMARKs
2	GF205T(22)	BRASS(SN)		동(CU)하지 2~3Um 석(SN) 3~5Um ± 0.1Um광택 도금	
1	WAFER	Nylon66		BLACK	

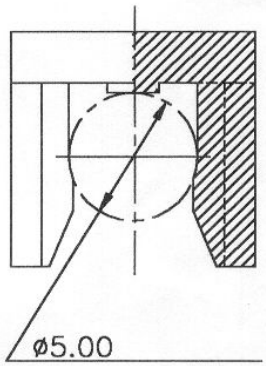
ITEM NAME	GF205B(22)	DWG NAME	GF205B(22)	SCALE	1 / 1
MODEL	STANDARD	DWG No.	STD01-055	DATE	2002.01.11
DESIGNED / CHECKED / CHECKED / APPROVED		FILE No.	FIT-STD01-055	GEO YOUNG	
		수 주 처	STANDARD		

QS-051-002(1) A4, A3

거영산업(주)







	GF 205C		NYLON-66			
NO.	DESCRIPTION		MATERIAL	Q'ty	TREATMENT	REMARKs
1~4	±0.1	4			SCALE 4/1	TITLE GF 205C
4~16	±0.2	3			DESIGNED	
16~63	±0.3	2			CHECKED	DWAG NO.
63~250	±0.5	1			APPROVED	GEO YOUNG
250~1000	±0.8					
1000~2000	±1.2					
GENERAL TOLERANCE		LTR	REVISION	SGN	DATE 94.01.05	

Underwriters Laboratories Inc.

IZLT2.E164123
Fuseholders, Cartridge Fuse - Component

Page Bottom Print-friendly version Questions? Previous Page

Fuseholders, Cartridge Fuse - Component

See General Information for Fuseholders, Cartridge Fuse - Component

GEO YOUNG INDUSTRY LTD E164123
520-6 HYOSUNG 2-DONG
GYEYANG-KU
INCHEON-SHI 403-042, KOREA

Cat. No.GF-205B with cover GF-205C .

Marking: Company name on fuse holder, and catalog designation on smallest package.

Last Updated on 1994-10-18

Page Top Notice of Disclaimer Questions? Previous Page

UL Listed and Classified Products UL Recognized Components Products Certified for Canada

Zertifikat
mit überwachter Konformität

Certificate
of surveyed conformity

TÜV

Zertifikat Nr. *Certificate No.*
J 50060831

Blatt *Page*
0001

Ihr Zeichen *Client Reference*	Unser Zeichen *Our Reference*	Ausstellungsdatum	*Date of Issue (day/mo/yr)*
Mr. T.C. Moon	ZKR3-KIS- 13004207 001	08.04.2005	

Genehmigungsinhaber *License Holder*
Geo Young Industry Ltd.
520-6, Hyoseong 2-dong, Gyeyang-gu
Incheon 403-042
Rep. of Korea

Fertigungsstätte *Manufacturing Plant*
Geo Young Industry Ltd.
520-6, Hyoseong 2-dong, Gyeyang-gu
Incheon 403-042
Rep. of Korea

Prüfzeichen *Test Mark*

TÜV

Geprüft nach *Tested acc. to*
EN 60127-1:1991+A1+A2
EN 60127-6:1994+A1+A2

Zertifiziertes Produkt *Certified Product*	(Geräteidentifikation) *(Product Identification)*	Lizenzentgelte - Einheit *License Fee - Unit*
Fuse-holder		
Type Designation	: GF205 series (Refer to appendix)	4
Rated Voltage	: 250V	
Rated current	: 10A	
Rated Power Acceptance at 23°C	: 2.4W	
For Cartridge Fuse-link	: 5 x 20mm	
Protection Against Electric Shock	: PC1	
Overvoltage Category	: II	

4

ANLAGE (Appendix): 1

Dem Zertifikat liegt unsere Prüf- und Zertifizierungsordnung zugrunde.
Das Produkt entspricht den o.g. Anforderungen, die Herstellung wird überwacht.
This certificate is based on our Testing and Certification Regulation. The product fulfills above-mentioned-requirements, the production is subject to surveillance.

TÜV Rheinland Product Safety GmbH, Am Grauen Stein, D-51105 Köln

Zertifizierungsstelle

Product Safety · Quality Assurance
TÜV Rheinland
Approved

Dipl.-Ing. U. Sonndag

TEST REPORT

Applicant : Dongyoung ENP

Address : 396-20, Dangsan-dong 3-ga, Yeongdeungpo-gu,
Seoul, Korea

Report No. RT14R-S1975-003-E

Date: Apr. 11, 2014

Sample Description	: The following submitted sample(s) said to be:-
Name/Type of Product	: RHODIA 2021SW BK
Sample ID No.	: RT14R-S1975-003
Manufacturer/Vendor	: Dongyoung ENP
Sample received	: Apr. 08, 2014
Testing Date	: Apr. 08, 2014 ~ Apr. 11, 2014
Test Type	: RoHS wet chemical analysis
Test Method(s)	: Please see the following page(s).
Test Result(s)	: Please see the following page(s).

* Note 1 : The test results presented in this report relate only to the object tested.

* Note 2 : This report shall not be reproduced except in full without the written approval of the testing laboratory.

Approved by,

Jade Jang / Lab. Technical Manager

Authorized by,

Bo Park / Lab. General Manager

Intertek Testing Services Korea Ltd.

Seoul Office: Tel : 02-6090-9500 Fax : 02-3409-0026 Daegu Office : Tel : 053-600-8647 Fax : 053-600-8645 Web Site : www.Intertek.co.kr
Seoul Lab. Address : 1/F, A-ju Digital Tower, #284-56, Seongsu 2-ga, Seongdong-Gu, Seoul, 133-833 Korea
Ulsan Lab. Address : #340-2, Yongam-Ri, Chongryang-Myun, Ulju-Gun, Ulsan 689-865 Korea

TEST REPORT

Report No. RT14R-S1975-003-E Date: Apr. 11, 2014

Sample ID No. : RT14R-S1975-003
Sample Description : RHODIA 2021SW BK

Test Item	Unit	Test Method	MDL	Result
Cadmium (Cd)	mg/kg	With reference to IEC 62321-5 Edition 1.0 : 2013, by acid digestion and determined by ICP-OES	0.5	N.D.
Lead (Pb)	mg/kg		5	N.D.
Mercury (Hg)	mg/kg	With reference to IEC 62321-4 Edition 1.0 : 2013, by acid digestion and determined by ICP-OES	2	N.D.
Hexavalent Chromium (Cr^{6+}) (For non-metal)	mg/kg	With reference to IEC 62321 Edition 1.0 : 2008, by alkaline digestion and determined by UV-VIS Spectrophotometer	1	N.D.
Polybrominated Biphenyl (PBBs)				
Monobromobiphenyl	mg/kg	With reference to IEC 62321 Edition 1.0 : 2008, by solvent extraction and determined by GC/MS	5	N.D.
Dibromobiphenyl	mg/kg		5	N.D.
Tribromobiphenyl	mg/kg		5	N.D.
Tetrabromobiphenyl	mg/kg		5	N.D.
Pentabromobiphenyl	mg/kg		5	N.D.
Hexabromobiphenyl	mg/kg		5	N.D.
Heptabromobiphenyl	mg/kg		5	N.D.
Octabromobiphenyl	mg/kg		5	N.D.
Nonabromobiphenyl	mg/kg		5	N.D.
Decabromobiphenyl	mg/kg		5	N.D.
Polybrominated Diphenyl Ether (PBDEs)				
Monobromodiphenyl ether	mg/kg	With reference to IEC 62321 Edition 1.0 : 2008, by solvent extraction and determined by GC/MS	5	N.D.
Dibromodiphenyl ether	mg/kg		5	N.D.
Tribromodiphenyl ether	mg/kg		5	N.D.
Tetrabromodiphenyl ether	mg/kg		5	N.D.
Pentabromodiphenyl ether	mg/kg		5	N.D.
Hexabromodiphenyl ether	mg/kg		5	N.D.
Heptabromodiphenyl ether	mg/kg		5	N.D.
Octabromodiphenyl ether	mg/kg		5	N.D.
Nonabromodiphenyl ether	mg/kg		5	N.D.
Decabromodiphenyl ether	mg/kg		5	N.D.

Tested by : Seonae Kim, Hyojoo Kim, Misun Lee

Notes : mg/kg = ppm = parts per million
< = Less than
N.D. = Not detected (<MDL)
MDL = Method detection limit

TEST REPORT

Report No. RT14R-S1975-003-E Date: Apr. 11, 2014

Sample ID No. : RT14R-S1975-003
Sample Description : RHODIA 2021SW BK

* View of sample as received;-

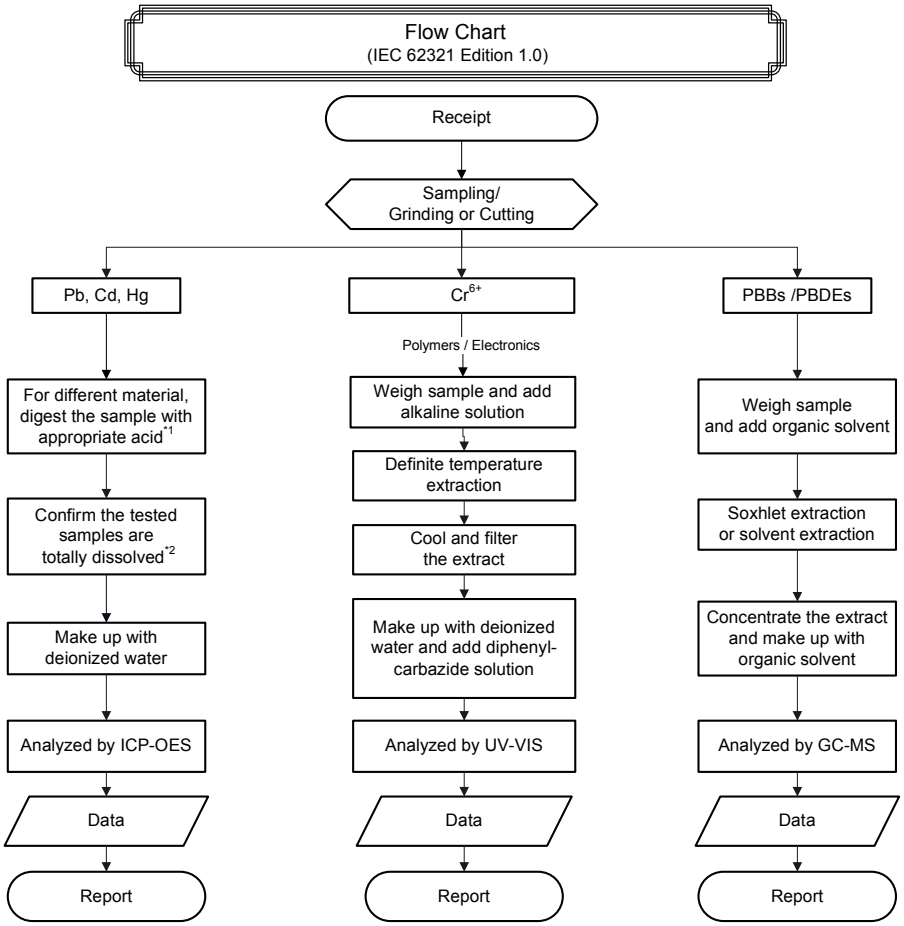
Intertek Testing Services Korea Ltd.

Seoul Office: Tel : 02-6090-9500 Fax : 02-3409-0026 Daegu Office : Tel : 053-600-8647 Fax : 053-600-8645 Web Site : www.Intertek.co.kr
Seoul Lab. Address : 1/F, A-ju Digital Tower, #284-56, Seongsu 2-ga, Seongdong-Gu, Seoul, 133-833 Korea
Ulsan Lab. Address : #340-2, Yongam-Ri, Chongryang-Myun, Ulju-Gun, Ulsan 689-865 Korea

TEST REPORT

Report No. RT14R-S1975-003-E Date: Apr. 11, 2014

Sample ID No. : RT14R-S1975-003
Sample Description : RHODIA 2021SW BK



Remarks :

*1 : List of appropriate acid :

Material	Acid added for digestion
Polymers	HNO_3, HCl, HF, H_2O_2, H_3BO_3
Metals	HNO_3, HCl, HF
Electronics	HNO_3, HCl, H_2O_2, HBF_4

*2 : The samples were dissolved totally by pre-conditioning method according to above flow chart.

***** End of Report *****

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