

Test Report

No.: CANEC24017575203

Date: Aug 14, 2024

Page 1 of 15

Client Name: FENGHUA SUPERCAPACITOR TECHNOLOGY CO.,LTD.

Client Address: 1F, ZHIHUI BUILDING, CUIKANG ROAD, YUNFU, GUANGDONG, PRC.

Sample Name: Lithium-ion Supercapacitors

The above sample(s) and information were provided by the client.

SGS Job No.: GZP24-026740

Sample Receiving Date: Aug 09, 2024

Testing Period: Aug 09, 2024 ~ Aug 14, 2024

Test Requested: Select test(s) as requested by the client.

Test Method(s): Please refer to next page(s).

Test Result(s): Please refer to next page(s).

Test Requirement	Conclusion
EU RoHS Directive (EU) 2015/863 amending Annex II to Directive 2011/65/EU - Lead, Mercury, Cadmium, Hexavalent chromium, Polybrominated biphenyls (PBB), Polybrominated diphenyl ethers (PBDE), Bis(2-ethylhexyl) phthalate (DEHP), Butyl benzyl phthalate (BBP), Dibutyl phthalate (DBP) and Diisobutyl phthalate (DIBP)	Pass
EU RoHS Directive (EU) 2015/863 amending Annex II to Directive 2011/65/EU- Lead, Mercury, Cadmium and Hexavalent chromium	Pass

Signed for and on behalf of
SGS-CSTC Standards Technical Services Co., Ltd. Guangzhou Branch

Jessie Li

Jessie-JX Li
Approved Signatory

scan to see the report



101972E5



SGS-CSTC Standards Technical Services Co., Ltd.
Guangzhou Branch Standards Technical Laboratory

Unless otherwise agreed in writing, this document is issued by the Company subject to its General Conditions of Service printed overleaf, available on request or accessible at <https://www.sgs.com/en/Terms-and-Conditions>. Attention is drawn to the limitation of liability, indemnification and jurisdiction issues defined therein. Any holder of this document is advised that information contained hereon reflects the Company's findings at the time of its intervention only and within the limits of Client's instructions, if any. The Company's sole responsibility is to its Client and this document does not exonerate parties to a transaction from exercising all their rights and obligations under the transaction documents. This document cannot be reproduced except in full, without prior written approval of the Company. Any unauthorized alteration, forgery or falsification of the content or appearance of this document is unlawful and offenders may be prosecuted to the fullest extent of the law. Unless otherwise stated the results shown in this test report refer only to the sample(s) tested.
Attention: To check the authenticity of testing /inspection report & certificate, please contact us at telephone: (86-755) 8307 1443, or email: CN.Doccheck@sgs.com

No.198, Kezhu Road, Science City, Economic & Technological Development Area, Guangzhou, Guangdong, China 510663
中国·广东·广州高新技术产业开发区科学城科珠路198号 邮编: 510663

t (86-20) 82155555 www.sgsgroup.com.cn
t (86-20) 82155555 sgs.china@sgs.com

Test Result(s):

Test Part Description:

SN ID	Sample No.	SGS Sample ID	Description
SN1	A1	CAN24-0175752-0001.C001	Black coating on the metal
SN2	A2	CAN24-0175752-0001.C002	Silvery metal
SN3	A3	CAN24-0175752-0001.C003	Copper-colored metal
SN4	A4	CAN24-0175752-0001.C004	Silvery metal
SN5	A5	CAN24-0175752-0001.C005	White paper
SN6	A6	CAN24-0175752-0001.C006	Brown single sided adhesive sheet
SN7	A8	CAN24-0175752-0001.C008	Black material
SN8	A9	CAN24-0175752-0001.C009	Silvery metal
SN9	A11	CAN24-0175752-0001.C011	Green tube w/ white printing
SN10	A12	CAN24-0175752-0001.C012	Colorless transparent liquid

Remarks:

- (1) 1 mg/kg = 1 ppm = 0.0001%
- (2) MDL = Method Detection Limit
- (3) ND = Not Detected (< MDL)
- (4) "-" = Not Regulated

EU RoHS Directive (EU) 2015/863 amending Annex II to Directive 2011/65/EU - Lead, Mercury, Cadmium, Hexavalent chromium, Polybrominated biphenyls (PBB), Polybrominated diphenyl ethers (PBDE), Bis(2-ethylhexyl) phthalate (DEHP), Butyl benzyl phthalate (BBP), Dibutyl phthalate (DBP) and Diisobutyl phthalate (DIBP)

Test Method: With reference to IEC 62321-4:2013+AMD1:2017, IEC 62321-5:2013, IEC 62321-7-2:2017 and IEC 62321-12:2023, analysis was performed by ICP-OES/AAS, UV-Vis and GC-MS.

Test Item(s)	Limit	Unit(s)	MDL	A1	A5	A6
Lead (Pb)	1000	mg/kg	2	ND	ND	ND
Mercury (Hg)	1000	mg/kg	2	ND	ND	ND
Cadmium (Cd)	100	mg/kg	2	ND	ND	ND
Hexavalent Chromium (Cr(VI))	1000	mg/kg	8	ND	ND	ND
Polybrominated biphenyls (PBB)	1000	mg/kg	-	ND	ND	ND
Monobrominated biphenyl (MonoBB)	-	mg/kg	25	ND	ND	ND
Dibrominated biphenyl (DiBB)	-	mg/kg	25	ND	ND	ND
Tribrominated biphenyl (TriBB)	-	mg/kg	25	ND	ND	ND
Tetrabrominated biphenyl (TetraBB)	-	mg/kg	25	ND	ND	ND
Pentabrominated biphenyl (PentaBB)	-	mg/kg	25	ND	ND	ND
Hexabrominated biphenyl (HexaBB)	-	mg/kg	25	ND	ND	ND
Heptabrominated biphenyl (HeptaBB)	-	mg/kg	25	ND	ND	ND
Octabrominated biphenyl (OctaBB)	-	mg/kg	25	ND	ND	ND
Nonabrominated biphenyl (NonaBB)	-	mg/kg	25	ND	ND	ND



Unless otherwise agreed in writing, this document is issued by the Company subject to its General Conditions of Service printed overleaf, available on request or accessible at <https://www.sgs.com/en/Terms-and-Conditions>. Attention is drawn to the limitation of liability, indemnification and jurisdiction issues defined therein. Any holder of this document is advised that information contained hereon reflects the Company's findings at the time of its intervention only and within the limits of Client's instructions, if any. The Company's sole responsibility is to its Client and this document does not exonerate parties to a transaction from exercising all their rights and obligations under the transaction documents. This document cannot be reproduced except in full, without prior written approval of the Company. Any unauthorized alteration, forgery or falsification of the content or appearance of this document is unlawful and offenders may be prosecuted to the fullest extent of the law. Unless otherwise stated the results shown in this test report refer only to the sample(s) tested.
Attention: To check the authenticity of testing /inspection report & certificate, please contact us at telephone: (86-755) 8307 1443, or email: CN.Doccheck@sgs.com

Test Report

No.: CANEC24017575203

Date: Aug 14, 2024

Page 3 of 15

Test Item(s)	Limit	Unit(s)	MDL	A1	A5	A6
Decabrominated biphenyl (DecaBB)	-	mg/kg	25	ND	ND	ND
Polybrominated diphenyl ethers (PBDE)	1000	mg/kg	-	ND	ND	ND
Monobrominated diphenyl ether (MonoBDE)	-	mg/kg	25	ND	ND	ND
Dibrominated diphenyl ether (DiBDE)	-	mg/kg	25	ND	ND	ND
Tribrominated diphenyl ether (TriBDE)	-	mg/kg	25	ND	ND	ND
Tetrabrominated diphenyl ether (TetraBDE)	-	mg/kg	25	ND	ND	ND
Pentabrominated diphenyl ether (PentaBDE)	-	mg/kg	25	ND	ND	ND
Hexabrominated diphenyl ether (HexaBDE)	-	mg/kg	25	ND	ND	ND
Heptabrominated diphenyl ether (HeptaBDE)	-	mg/kg	25	ND	ND	ND
Octabrominated diphenyl ether (OctaBDE)	-	mg/kg	25	ND	ND	ND
Nonabrominated diphenyl ether (NonaBDE)	-	mg/kg	25	ND	ND	ND
Decabrominated diphenyl ether (DecaBDE)	-	mg/kg	25	ND	ND	ND
Di-2-Ethyl Hexyl Phthalate (DEHP)	1000	mg/kg	50	ND	ND	ND
Benzyl Butyl Phthalate (BBP)	1000	mg/kg	50	ND	ND	ND
Dibutyl Phthalate (DBP)	1000	mg/kg	50	ND	ND	ND
Diisobutyl Phthalate (DIBP)	1000	mg/kg	50	ND	ND	ND

Test Item(s)	Limit	Unit(s)	MDL	A8	A11
Lead (Pb)	1000	mg/kg	2	4	ND
Mercury (Hg)	1000	mg/kg	2	ND	ND
Cadmium (Cd)	100	mg/kg	2	ND	ND
Hexavalent Chromium (Cr(VI))	1000	mg/kg	8	ND	ND
Polybrominated biphenyls (PBB)	1000	mg/kg	-	ND	ND
Monobrominated biphenyl (MonoBB)	-	mg/kg	25	ND	ND
Dibrominated biphenyl (DiBB)	-	mg/kg	25	ND	ND
Tribrominated biphenyl (TriBB)	-	mg/kg	25	ND	ND
Tetrabrominated biphenyl (TetraBB)	-	mg/kg	25	ND	ND
Pentabrominated biphenyl (PentaBB)	-	mg/kg	25	ND	ND
Hexabrominated biphenyl (HexaBB)	-	mg/kg	25	ND	ND
Heptabrominated biphenyl (HeptaBB)	-	mg/kg	25	ND	ND
Octabrominated biphenyl (OctaBB)	-	mg/kg	25	ND	ND



Unless otherwise agreed in writing, this document is issued by the Company subject to its General Conditions of Service printed overleaf, available on request or accessible at <https://www.sgs.com/en/Terms-and-Conditions>. Attention is drawn to the limitation of liability, indemnification and jurisdiction issues defined therein. Any holder of this document is advised that information contained herein reflects the Company's findings at the time of its intervention only and within the limits of Client's instructions, if any. The Company's sole responsibility is to its Client and this document does not exonerate parties to a transaction from exercising all their rights and obligations under the transaction documents. This document cannot be reproduced except in full, without prior written approval of the Company. Any unauthorized alteration, forgery or falsification of the content or appearance of this document is unlawful and offenders may be prosecuted to the fullest extent of the law. Unless otherwise stated the results shown in this test report refer only to the sample(s) tested.

Attention: To check the authenticity of testing inspection report & certificate, please contact us at telephone: (86-755) 8307 1443, or email: CN.Doccheck@sgs.com

SGS-CSTC Standards Technical Services Co., Ltd.
Guangzhou Branch / 广州分公司 技术实验室

No.198, Kezhu Road, Science City, Economic & Technological Development Area, Guangzhou, Guangdong, China 510663
中国·广东·广州高新技术产业开发区科学城科珠路198号 邮编: 510663

t (86-20) 82155555 www.sgsgroup.com.cn
t (86-20) 82155555 sgs.china@sgs.com

Test Report

No.: CANEC24017575203

Date: Aug 14, 2024

Page 4 of 15

Test Item(s)	Limit	Unit(s)	MDL	A8	A11
Nonabrominated biphenyl (NonaBB)	-	mg/kg	25	ND	ND
Decabrominated biphenyl (DecaBB)	-	mg/kg	25	ND	ND
Polybrominated diphenyl ethers (PBDE)	1000	mg/kg	-	ND	ND
Monobrominated diphenyl ether (MonoBDE)	-	mg/kg	25	ND	ND
Dibrominated diphenyl ether (DiBDE)	-	mg/kg	25	ND	ND
Tribrominated diphenyl ether (TriBDE)	-	mg/kg	25	ND	ND
Tetrabrominated diphenyl ether (TetraBDE)	-	mg/kg	25	ND	ND
Pentabrominated diphenyl ether (PentaBDE)	-	mg/kg	25	ND	ND
Hexabrominated diphenyl ether (HexaBDE)	-	mg/kg	25	ND	ND
Heptabrominated diphenyl ether (HeptaBDE)	-	mg/kg	25	ND	ND
Octabrominated diphenyl ether (OctaBDE)	-	mg/kg	25	ND	ND
Nonabrominated diphenyl ether (NonaBDE)	-	mg/kg	25	ND	ND
Decabrominated diphenyl ether (DecaBDE)	-	mg/kg	25	ND	ND
Di-2-Ethyl Hexyl Phthalate (DEHP)	1000	mg/kg	50	ND	ND
Benzyl Butyl Phthalate (BBP)	1000	mg/kg	50	ND	ND
Dibutyl Phthalate (DBP)	1000	mg/kg	50	ND	ND
Diisobutyl Phthalate (DIBP)	1000	mg/kg	50	ND	ND

Notes:

- (1) The maximum permissible limit is quoted from RoHS Directive (EU) 2015/863.
- (2) IEC 62321 series is equivalent to EN 62321 series.
- (3) The restriction of DEHP, BBP, DBP and DIBP shall apply to medical devices, including in vitro medical devices, and monitoring and control instruments, including industrial monitoring and control instruments, from 22 July 2021.

Test Method: With reference to IEC 62321-4:2013+AMD1:2017, IEC 62321-5:2013, IEC 62321-7-2:2017 and IEC 62321-12:2023, analysis was performed by ICP-OES/AAS, UV-Vis and GC-MS.

Test Item(s)	Limit	Unit(s)	MDL	A12
Lead (Pb)	1000	mg/kg	2	ND
Mercury (Hg)	1000	mg/kg	2	ND
Cadmium (Cd)	100	mg/kg	2	ND
Hexavalent Chromium (Cr(VI))	1000	mg/kg	8	ND
Polybrominated biphenyls (PBB)	1000	mg/kg	-	ND
Monobrominated biphenyl (MonoBB)	-	mg/kg	25	ND



Unless otherwise agreed in writing, this document is issued by the Company subject to its General Conditions of Service printed overleaf, available on request or accessible at <https://www.sgs.com/en/Terms-and-Conditions>. Attention is drawn to the limitation of liability, indemnification and jurisdiction issues defined therein. Any holder of this document is advised that information contained herein reflects the Company's findings at the time of its intervention only and within the limits of Client's instructions, if any. The Company's sole responsibility is to its Client and this document does not exonerate parties to a transaction from exercising all their rights and obligations under the transaction documents. This document cannot be reproduced except in full, without prior written approval of the Company. Any unauthorized alteration, forgery or falsification of the content or appearance of this document is unlawful and offenders may be prosecuted to the fullest extent of the law. Unless otherwise stated the results shown in this test report refer only to the sample(s) tested.
Attention: To check the authenticity of testing / inspection report & certificate, please contact us at telephone: (86-755) 8307 1443, or email: CN.Doccheck@sgs.com

Test Report

No.: CANEC24017575203

Date: Aug 14, 2024

Page 5 of 15

Test Item(s)	Limit	Unit(s)	MDL	A12
Dibrominated biphenyl (DiBB)	-	mg/kg	25	ND
Tribrominated biphenyl (TriBB)	-	mg/kg	25	ND
Tetrabrominated biphenyl (TetraBB)	-	mg/kg	25	ND
Pentabrominated biphenyl (PentaBB)	-	mg/kg	25	ND
Hexabrominated biphenyl (HexaBB)	-	mg/kg	25	ND
Heptabrominated biphenyl (HeptaBB)	-	mg/kg	25	ND
Octabrominated biphenyl (OctaBB)	-	mg/kg	25	ND
Nonabrominated biphenyl (NonaBB)	-	mg/kg	25	ND
Decabrominated biphenyl (DecaBB)	-	mg/kg	25	ND
Polybrominated diphenyl ethers (PBDE)	1000	mg/kg	-	ND
Monobrominated diphenyl ether (MonoBDE)	-	mg/kg	25	ND
Dibrominated diphenyl ether (DiBDE)	-	mg/kg	25	ND
Tribrominated diphenyl ether (TriBDE)	-	mg/kg	25	ND
Tetrabrominated diphenyl ether (TetraBDE)	-	mg/kg	25	ND
Pentabrominated diphenyl ether (PentaBDE)	-	mg/kg	25	ND
Hexabrominated diphenyl ether (HexaBDE)	-	mg/kg	25	ND
Heptabrominated diphenyl ether (HeptaBDE)	-	mg/kg	25	ND
Octabrominated diphenyl ether (OctaBDE)	-	mg/kg	25	ND
Nonabrominated diphenyl ether (NonaBDE)	-	mg/kg	25	ND
Decabrominated diphenyl ether (DecaBDE)	-	mg/kg	25	ND
Di-2-Ethyl Hexyl Phthalate (DEHP)	1000	mg/kg	50	ND
Benzyl Butyl Phthalate (BBP)	1000	mg/kg	50	ND
Dibutyl Phthalate (DBP)	1000	mg/kg	50	ND
Diisobutyl Phthalate (DIBP)	1000	mg/kg	50	ND

Notes:

- (1) The maximum permissible limit is quoted from RoHS Directive (EU) 2015/863.
- (2) IEC 62321 series is equivalent to EN 62321 series.
- (3) The restriction of DEHP, BBP, DBP and DIBP shall apply to medical devices, including in vitro medical devices, and monitoring and control instruments, including industrial monitoring and control instruments, from 22 July 2021.

EU RoHS Directive (EU) 2015/863 amending Annex II to Directive 2011/65/EU- Lead, Mercury, Cadmium and Hexavalent chromium

Test Method: With reference to IEC 62321-4:2013+AMD1:2017, IEC 62321-5:2013 and IEC 62321-7-1:2015, analysis was performed by ICP-OES/AAS and UV-Vis.

Test Item(s)	Limit	Unit(s)	MDL	A2	A3	A4
Lead (Pb)	1000	mg/kg	2	ND	ND	6
Mercury (Hg)	1000	mg/kg	2	ND	ND	ND



SGS-CST Standards Technical Services Co., Ltd.
Guangzhou Branch, China Technical Laboratory

Unless otherwise agreed in writing, this document is issued by the Company subject to its General Conditions of Service printed overleaf, available on request or accessible at <https://www.sgs.com/en/Terms-and-Conditions>. Attention is drawn to the limitation of liability, indemnification and jurisdiction issues defined therein. Any holder of this document is advised that information contained hereon reflects the Company's findings at the time of its intervention only and within the limits of Client's instructions, if any. The Company's sole responsibility is to its Client and this document does not exonerate parties to a transaction from exercising all their rights and obligations under the transaction documents. This document cannot be reproduced except in full, without prior written approval of the Company. Any unauthorized alteration, forgery or falsification of the content or appearance of this document is unlawful and offenders may be prosecuted to the fullest extent of the law. Unless otherwise stated the results shown in this test report refer only to the sample(s) tested.
Attention: To check the authenticity of testing / inspection report & certificate, please contact us at telephone: (86-755) 8307 1443, or email: CN.Doccheck@sgs.com

No.198, Kezhu Road, Science City, Economic & Technological Development Area, Guangzhou, Guangdong, China 510663
中国·广东·广州高新技术产业开发区科学城科珠路198号 邮编: 510663

t (86-20) 82155555 www.sgs.com.cn
t (86-20) 82155555 sgs.china@sgs.com

Test Report

No.: CANEC24017575203

Date: Aug 14, 2024

Page 6 of 15

Test Item(s)	Limit	Unit(s)	MDL	A2	A3	A4
Cadmium (Cd)	100	mg/kg	2	ND	ND	ND
Hexavalent Chromium (Cr(VI)) ▼	-	µg/cm ²	0.10	ND	ND	ND

Test Item(s)	Limit	Unit(s)	MDL	A9
Lead (Pb)	1000	mg/kg	2	7
Mercury (Hg)	1000	mg/kg	2	ND
Cadmium (Cd)	100	mg/kg	2	ND
Hexavalent Chromium (Cr(VI)) ▼	-	µg/cm ²	0.10	ND

Notes:

- (1) The maximum permissible limit is quoted from RoHS Directive (EU) 2015/863.
- (2) IEC 62321 series is equivalent to EN 62321 series.
- (3) ▼ =
 - a. The sample is positive for Cr(VI) if the Cr(VI) concentration is greater than 0.13 µg/cm². The sample coating is considered to contain Cr(VI).
 - b. The sample is negative for Cr(VI) if Cr(VI) is ND (concentration less than 0.10 µg/cm²). The coating is considered a non-Cr(VI) based coating.
 - c. The result between 0.10 µg/cm² and 0.13 µg/cm² is considered to be inconclusive-unavoidable coating variations may influence the determination.

Information on storage conditions and production date of the tested sample is unavailable and thus Cr(VI) results represent status of the sample at the time of testing.

Unless otherwise stated, the decision rule for conformity reporting is based on Binary Statement for Simple Acceptance Rule (w=0) stated in ILAC-G8:09/2019.



Unless otherwise agreed in writing, this document is issued by the Company subject to its General Conditions of Service printed overleaf, available on request or accessible at <https://www.sgs.com/en/Terms-and-Conditions>. Attention is drawn to the limitation of liability, indemnification and jurisdiction issues defined therein. Any holder of this document is advised that information contained hereon reflects the Company's findings at the time of its intervention only and within the limits of Client's instructions, if any. The Company's sole responsibility is to its Client and this document does not exonerate parties to a transaction from exercising all their rights and obligations under the transaction documents. This document cannot be reproduced except in full, without prior written approval of the Company. Any unauthorized alteration, forgery or falsification of the content or appearance of this document is unlawful and offenders may be prosecuted to the fullest extent of the law. Unless otherwise stated the results shown in this test report refer only to the sample(s) tested.
Attention: To check the authenticity of testing /inspection report & certificate, please contact us at telephone: (86-755) 8307 1443, or email: CN.Doccheck@sgs.com

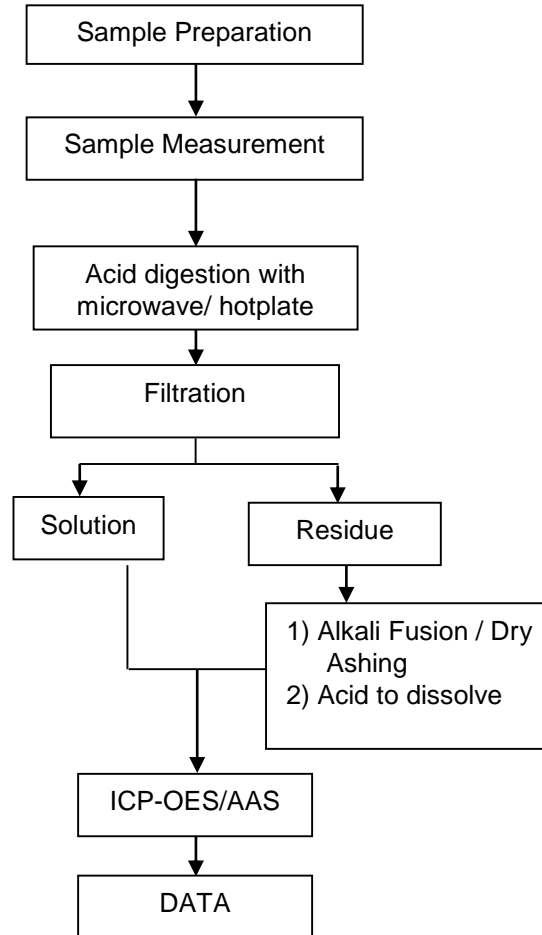
SGS-CSTC Standards Technical Services Co., Ltd.
 Guangzhou Branch Technical Laboratory

No.198, Kezhu Road, Science City, Economic & Technological Development Area, Guangzhou, Guangdong, China 510663
 中国·广东·广州高新技术产业开发区科学城科珠路198号 邮编: 510663

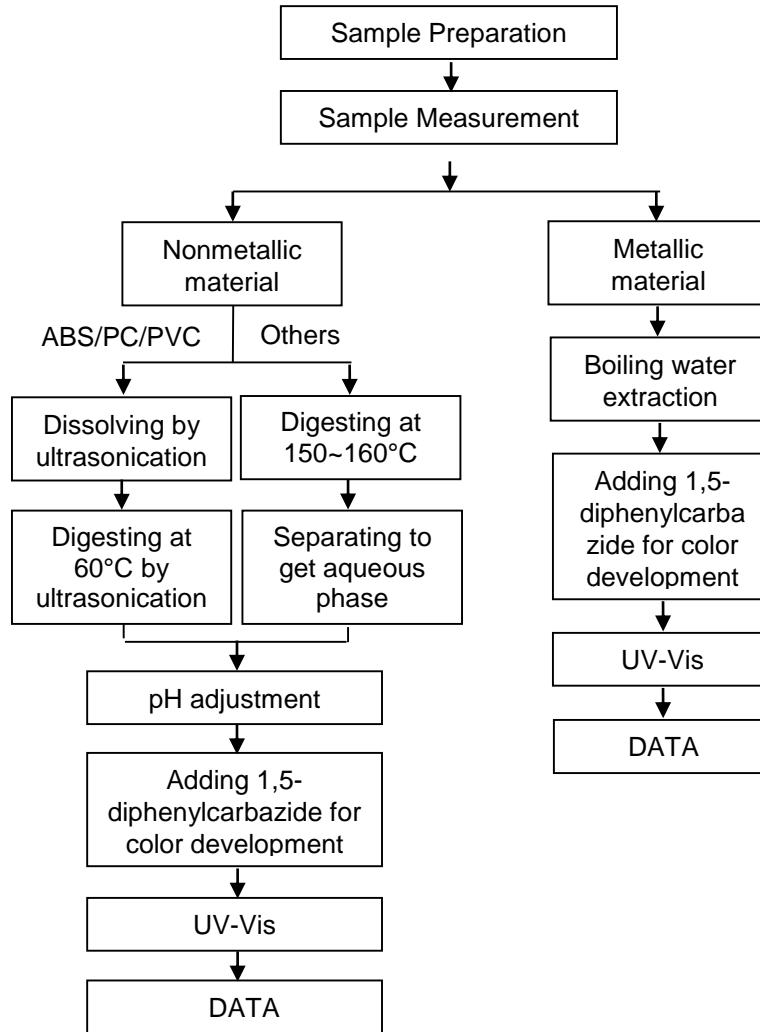
t (86-20) 82155555 www.sgsgroup.com.cn
 t (86-20) 82155555 sgs.china@sgs.com

Elements Testing Flow Chart

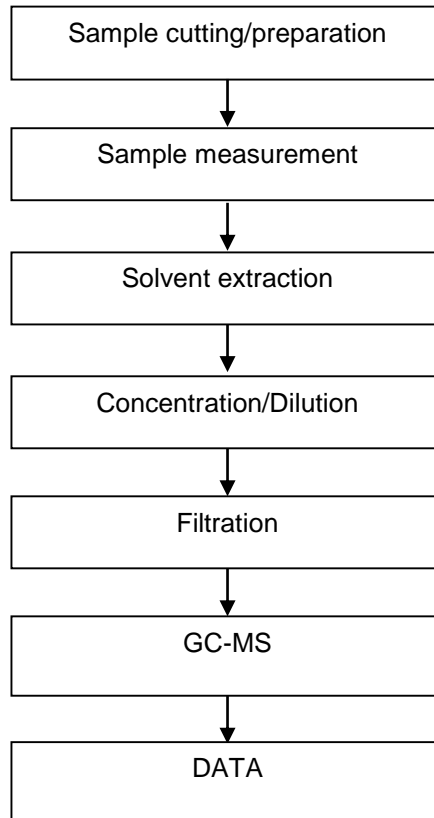
These samples were dissolved totally by pre-conditioning method according to below flow chart.



Hexavalent Chromium (Cr(VI)) Testing Flow Chart



PBBs/PBDEs/Phthalates Testing Flow Chart



Test Report

No.: CANEC24017575203

Date: Aug 14, 2024

Page 10 of 15

Sample Photo:



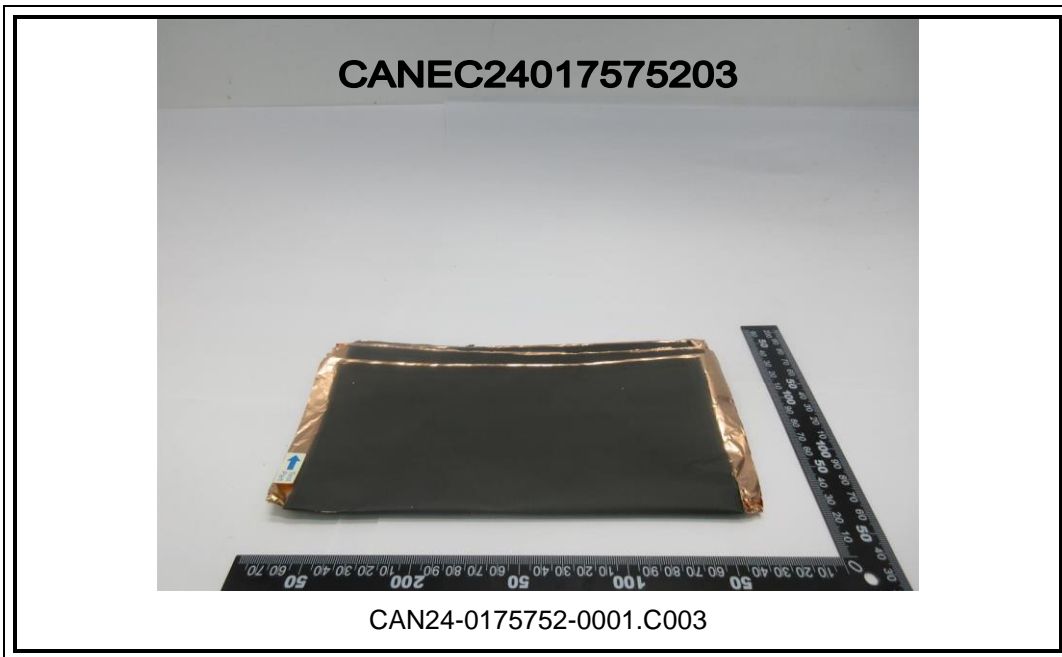
SGS-CSTC Standards Technical Services Co., Ltd.
Guangzhou Branch Technical Services Co., Ltd. Technical Laboratory

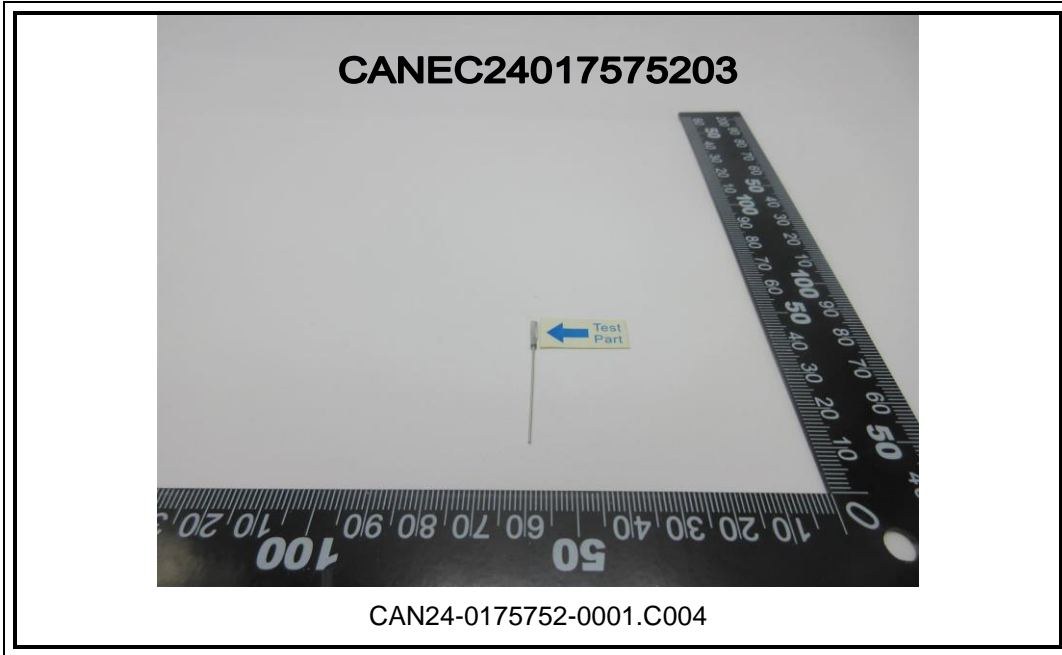
Unless otherwise agreed in writing, this document is issued by the Company subject to its General Conditions of Service printed overleaf, available on request or accessible at <https://www.sgs.com/en/Terms-and-Conditions>. Attention is drawn to the limitation of liability, indemnification and jurisdiction issues defined therein. Any holder of this document is advised that information contained hereon reflects the Company's findings at the time of its intervention only and within the limits of Client's instructions, if any. The Company's sole responsibility is to its Client and this document does not exonerate parties to a transaction from exercising all their rights and obligations under the transaction documents. This document cannot be reproduced except in full, without prior written approval of the Company. Any unauthorized alteration, forgery or falsification of the content or appearance of this document is unlawful and offenders may be prosecuted to the fullest extent of the law. Unless otherwise stated the results shown in this test report refer only to the sample(s) tested.

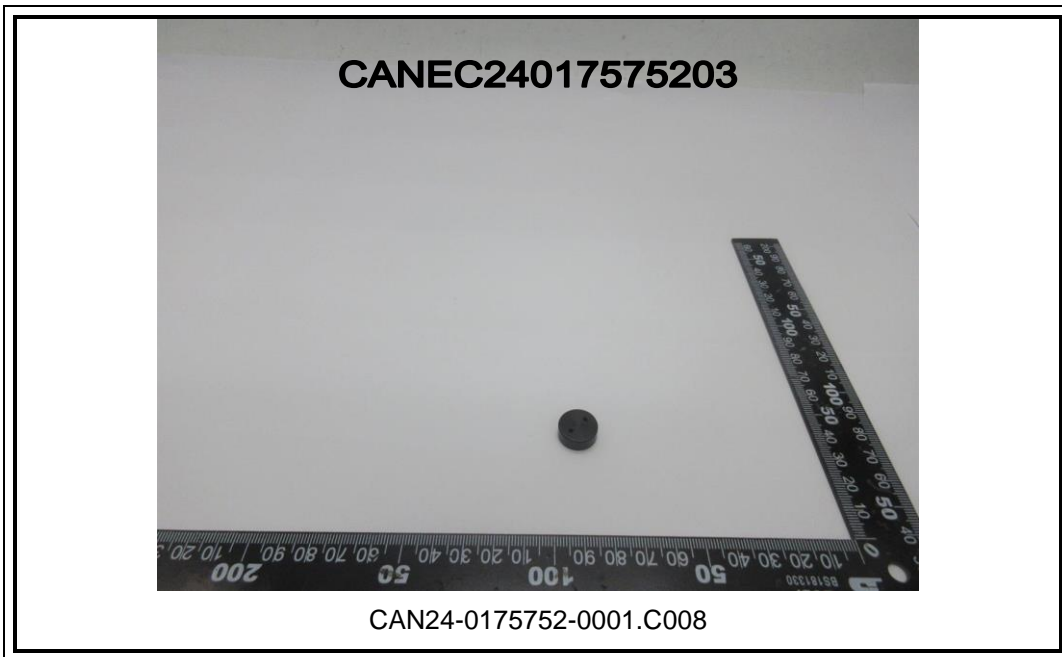
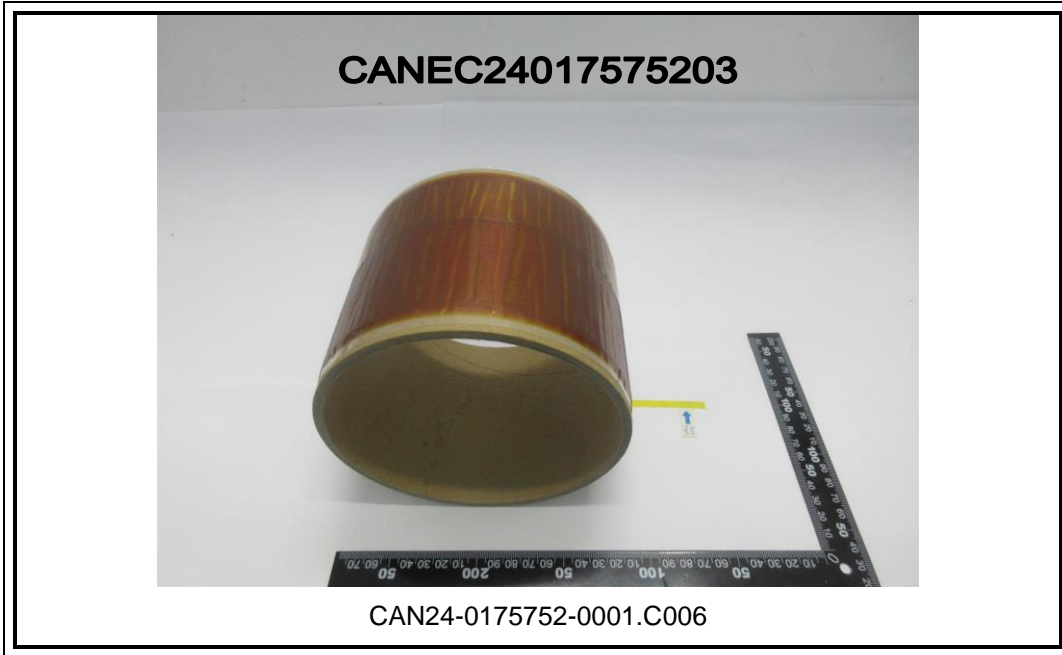
Attention: To check the authenticity of testing /inspection report & certificate, please contact us at telephone: (86-755) 8307 1443, or email: CN.Doccheck@sgs.com

No.198, Kezhu Road, Science City, Economic & Technological Development Area, Guangzhou, Guangdong, China 510663
中国·广东·广州高新技术产业开发区科学城科珠路198号 邮编: 510663

t (86-20) 82155555 www.sgs.com
t (86-20) 82155555 sgs.china@sgs.com











SGS authenticate the photo on original report only
*** End of Report ***

