

TEST REPORT

No.: SZIN2607002034PL01_EN

Issue Date: 2026-08-10

Page: 1 of 16

CUSTOMER NAME: CARTHAGE GMBH

ADDRESS: LIETZENBURGER STR. 9A, 10789 BERLIN, GERMANY

Sample Name : FINISHED BAG MADE FROM STONE PAPER AND PP WOVEN
COMPOSITE TUBE FABRIC

Product Specification : Total Grammage: 115 g/m²~200 g/m²,
Tube Width: 350mm~550mm
Roll Length Customizable

Manufacturer : WENZHOU FUFANG TECHNOLOGY CO., LTD.

Buyer : CARTHAGE GMBH

Material : 1. Stone Paper Layer: 45.0%~70.0% - Main Components: Calcium
Carbonate (CaCO₃) approx. 70-80%, Polyethylene (PE) approx.
20-30%
2. PP Woven Layer: 30.0%~45.0% - Main Components: 100% Virgin
Polypropylene (PP)
3. PE Lamination Layer: 5.0%~10.0% - Main Components: PE
Extrusion Lamination Resin

Country Of : Germany

Destination

Above information and sample(s) was/were submitted and confirmed by the client. SGS, however, assumes no responsibility to verify the accuracy, adequacy and completeness of the sample information provided by client.

SGS Ref. No. : SL92619338267401TX; GZMR260702623301

Sample Source : Customer-delivered

Date of Receipt : 2026-07-21

Testing Period : 2026-07-21 ~ 2026-08-10

Test result(s) : For further details, please refer to the following page(s)
(Unless otherwise stated the results shown in this test report refer only
to the sample(s) tested)

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

James Zheng

James Zheng

Authorized signatory

Scan to see the report



SZIN2607002034PL01
Verification:
check.sgs.com.cn



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 and such sample(s) are retained for 30 days only.

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.
Shenzhen Branch Testing Center Materials Laboratory

Room 101-501, Plant 4 & Room 101, Plant 2 & Room 101, Plant 3 & Room 301-501, Plant 3, Jiangshao (Bantian) Industrial Plant Area, No. 430, Jihua Road, Bantian Community, Bantian Street, Longgang District, Shenzhen, Guangdong, China 518129 www.sgs.com
中国·广东·深圳市龙岗区坂田街道坂田社区吉华路430号江灏(坂田)工业厂区厂房4号101-501、2号101、3号101、3号301-501 邮编:518129 t(86-755) 25328673 sgs.china@sgs.com

TEST REPORT

No.: SZIN2607002034PL01_EN

Issue Date: 2026-08-10

Page: 2 of 16

Summary of Results:

No.	Test Item	Test Method	Result	Conclusion
1	Free Fall	ASTM D5276-19(Reapproved 2023)	See result	Pass
2	Seam Test	ISO 13935-2:2026	See result	N/A
3	Tensile Test	ISO 13934-1:2013	See result	N/A
4	Tear Strength	ISO 13937-2:2000 and client's requirement	120N	N/A
5	T-Peel Test	ISO 11339:2022	See result	N/A
6	Water Resistance	ISO 811:2018	See result	N/A

Note:

Pass : Meet the requirements;

Fail : Does not meet the requirements;

N/A : Not Apply to the judgment.

TEST REPORT

No.: SZIN2607002034PL01_EN

Issue Date: 2026-08-10

Page: 3 of 16

1. Test Item: Free Fall

Sample Description: A-Finished product

Test Method: ASTM D5276-19(Reapproved 2023)

Test Condition:

Drop Height: 1.2 m

Falling Ground: Steel Plate

Number of drops: Front 2 times, back 2 times, side 3 times, bottom 3 times, a total of 10 times

Lab Environmental Condition: 18 °C - 28 °C, 25 %RH - 75 %RH

Test Result:

Sample A

Specimen	Result	Client's requirement	Conclusion
1	No visible rupture was observed on the bag. No visible tearing or cracking was observed at the seams, and no visible leakage of the filling material was detected.	The bag remains intact with no rupture. No tearing or cracking is observed at the seams, and no leakage of the filling material is detected.	Pass

Test Photo:



Original Sample-Sample A



During Test-Sample A (bottom)

TEST REPORT

No.: SZIN2607002034PL01_EN

Issue Date: 2026-08-10

Page: 4 of 16



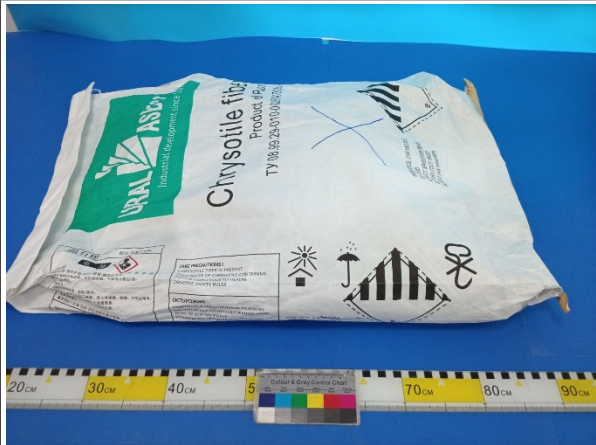
During Test-Sample A (side)



During Test-Sample A (back)



During Test-Sample A (front)



Before Test-Sample A-Obverse

TEST REPORT

No.: SZIN2607002034PL01_EN

Issue Date: 2026-08-10

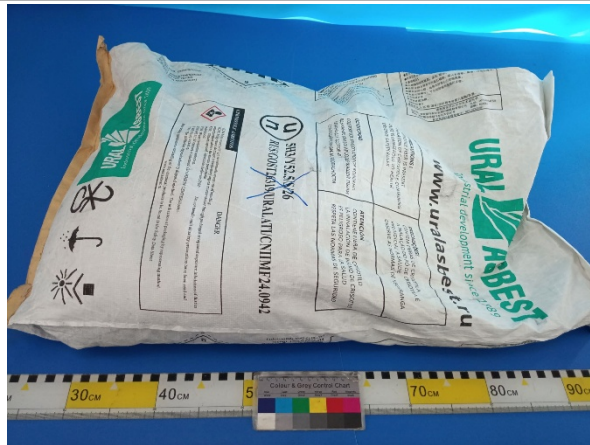
Page: 5 of 16



Before Test-Sample A-Reverse



After Test-Sample A-Obverse



After Test-Sample A-Reverse

Equipment Information:

Equipment Name	Model	Equipment No.	Calibration date	Next Calibration date
Drop Tester	XL-501	GZMR-RL-E249	2025-12-26	2026-12-25

TEST REPORT

No.: SZIN2607002034PL01_EN

Issue Date: 2026-08-10

Page: 6 of 16

2. Test Item: Seam Test

Sample Description: A-Finished product

Test Method: ISO 13935-2:2026

Test Condition:

Test Speed: 50 mm/min

Initial distance between grips: 100mm

Lab Environmental Condition: (23 ± 2) °C, (50 ± 5) %RH

Test Result:

Sample A

Test Item	Test Result	
Maximum Force at Seam Rupture	Edge seam	650N (See Note 2)
	Bottom side	480N (See Note 3)

Note:

1. Test specimens were cut from the sample.
2. Failure type: fabric tear at the seam.
3. Failure type: fabric tear at the seam + breakage of sewing threads.

Test Photo:



Original Sample-Sample A

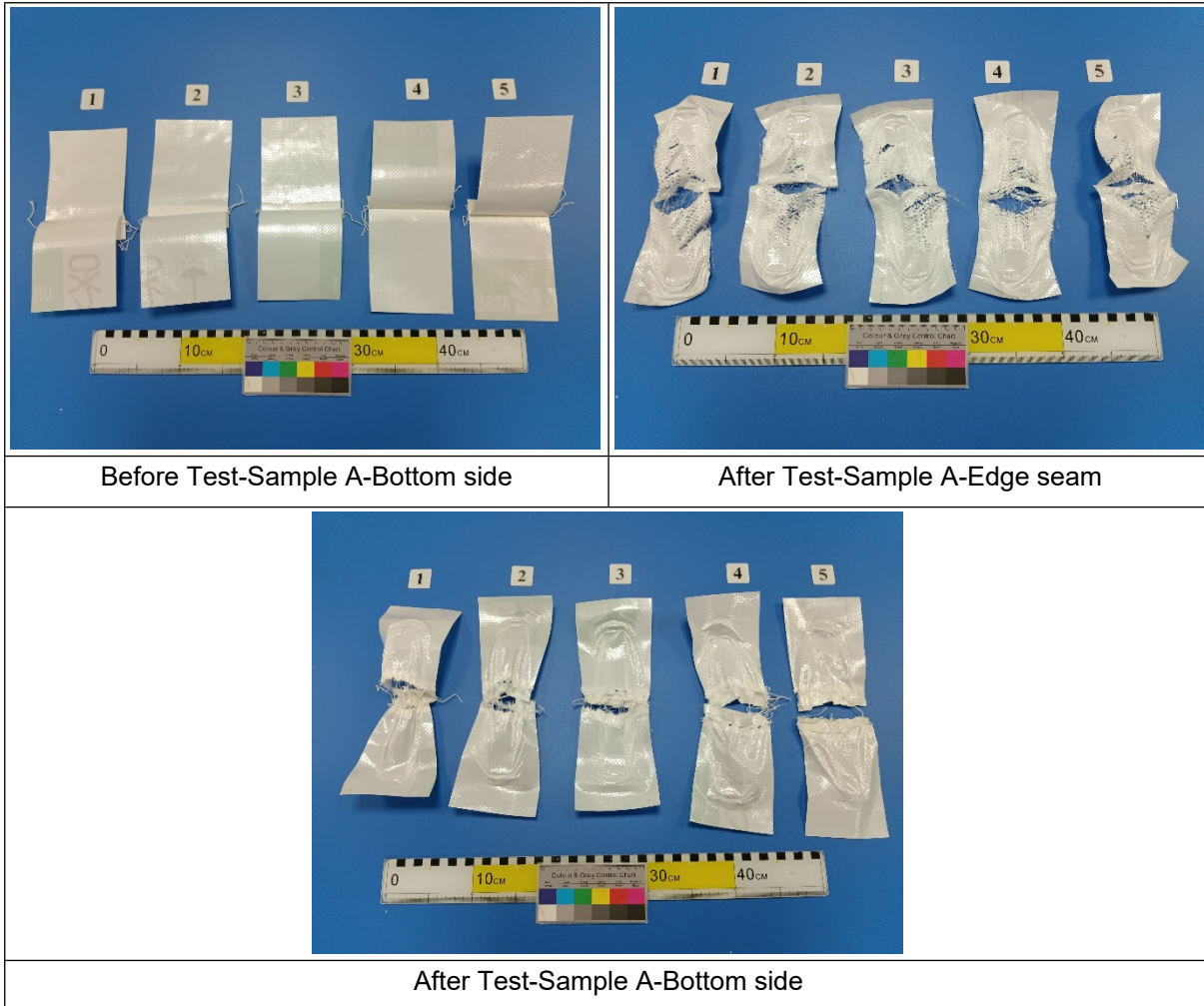
Before Test-Sample A-Edge seam

TEST REPORT

No.: SZIN2607002034PL01_EN

Issue Date: 2026-08-10

Page: 7 of 16



Equipment Information:

Equipment Name	Model	Equipment No.	Calibration date	Next Calibration date
Universal Testing Machine	Z030	GZMR-PL-E140	2026-03-25	2027-03-24



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 and such sample(s) are retained for 30 days only.

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.
Shenzhen Branch Testing Center Materials Laboratory

Room 101-501, Plant 4 & Room 101, Plant 2 & Room 101, Plant 3 & Room 301-501, Plant 3, Jianghao (Bantian) Industrial Plant Area, No. 430, Jihua Road, Bantian Community, Bantian Street, Longgang District, Shenzhen, Guangdong, China 518129 www.sgs.com
中国·广东·深圳市龙岗区坂田街道坂田社区吉华路430号江灏(坂田)工业厂区厂房4号101-901、2号101、3号101、3号301-501 邮编:518129 t:(86-755) 25328673 sgs.china@sgs.com

TEST REPORT

No.: SZIN2607002034PL01_EN

Issue Date: 2026-08-10

Page: 8 of 16

3. Test Item: Tensile Test

Sample Description: A1-Finished product, A2-Finished product

Test Method: ISO 13934-1:2013

Lab Environmental Condition: (23 ± 2) °C, (50 ± 5) %RH

Test Condition:

Specimen Width: 50 mm

Grip Separation: 200 mm

Test Result:

Sample A1-X direction

Test Speed: 100 mm/min

Test Item	Force at Rupture, N	Elongation at Rupture, %
Test Result	780	17.5

Notes: Test specimens were cut from the sample.

Sample A2-Y direction

Test Speed: 100 mm/min

Test Item	Force at Rupture, N	Elongation at Rupture, %
Test Result	850	22.0

Notes: Test specimens were cut from the sample.

TEST REPORT

No.: SZIN2607002034PL01_EN

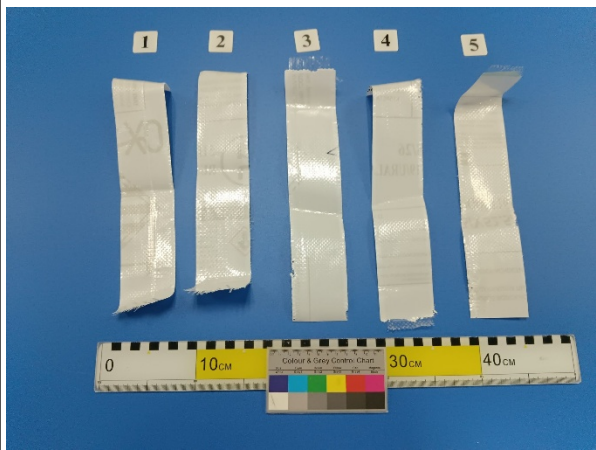
Issue Date: 2026-08-10

Page: 9 of 16

Test Photo:



Original Sample-Sample A1



Before Test-Sample A1



After Test-Sample A1



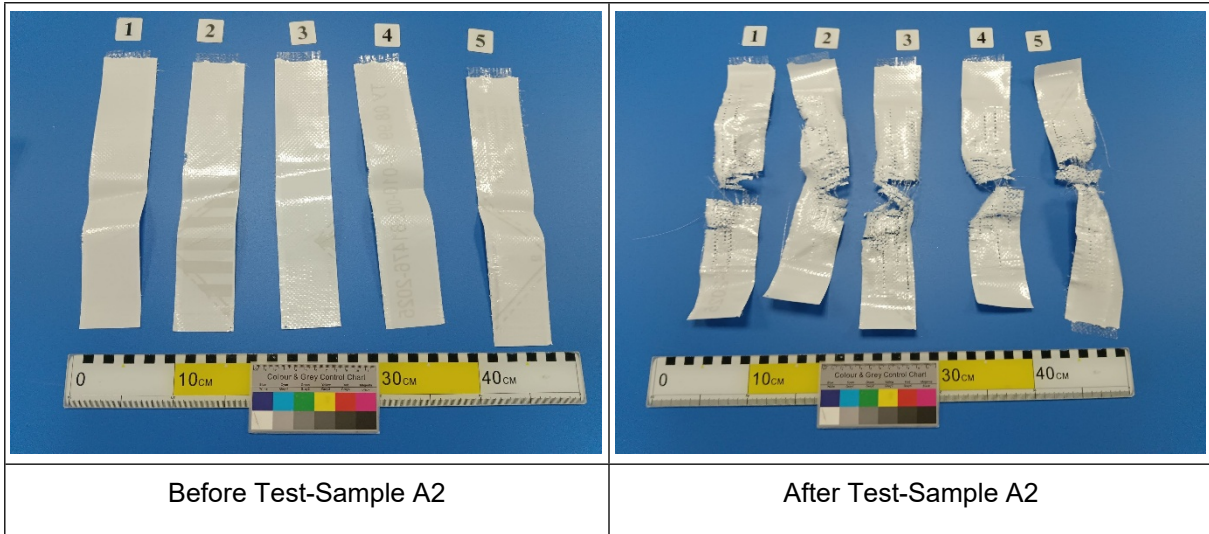
Original Sample-Sample A2

TEST REPORT

No.: SZIN2607002034PL01_EN

Issue Date: 2026-08-10

Page: 10 of 16



Equipment Information:

Equipment Name	Model	Equipment No.	Calibration date	Next Calibration date
Universal Testing Machine	Z030	GZMR-PL-E140	2026-03-25	2027-03-24

TEST REPORT

No.: SZIN2607002034PL01_EN

Issue Date: 2026-08-10

Page: 11 of 16

4. Test Item: Tear Strength

Sample Description: A1-Finished product, A2-Finished product

Test Method: ISO 13937-2:2000 and client's requirement

Lab Environmental Condition: (23 ± 2) °C, (50 ± 5) %RH

Test Condition:

Specimen thickness: 0.139 mm

Test Result:

Sample A1-X direction

Test Speed:100 mm/min

Grip Separation:100 mm

Test Item	Tear Strength, N
Test Result	120

Notes:

1. Test specimens were cut from the sample.
2. The result was maximum force, and the result was for reference only as the specimen experiences yarn pulling during tearing.

Sample A2-Y direction

Test Speed:100 mm/min

Grip Separation:100 mm

Test Item	Tear Strength, N
Test Result	120

Notes:

1. Test specimens were cut from the sample.
2. The result was maximum force, and the result was for reference only as the specimen experiences yarn pulling during tearing.



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 and such sample(s) are retained for 30 days only.

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.
Shenzhen Branch Testing & Inspection Services Co., Ltd.

Room 101-501, Plant 4 & Room 101, Plant 2 & Room 101, Plant 3 & Room 301-501, Plant 3, Jianghao (Bantian) Industrial Plant Area, No. 430, Jihua Road, Bantian Community, Bantian Street, Longgang District, Shenzhen, Guangdong, China 518129 www.sgs.com
中国·广东·深圳市龙岗区坂田街道坂田社区吉华路430号江豪（坂田）工业厂区厂房4号101-901、2号101、3号101、3号301-501 邮编:518129 t(86-755) 25328673 sgs.china@sgs.com

TEST REPORT

No.: SZIN2607002034PL01_EN

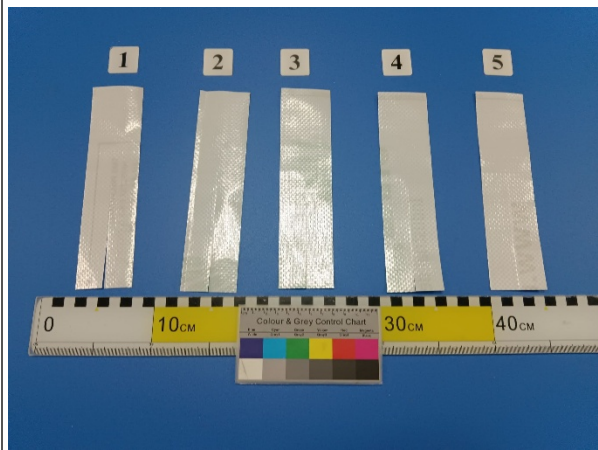
Issue Date: 2026-08-10

Page: 12 of 16

Test Photo:



Original Sample-Sample A1



Before Test-Sample A1



After Test-Sample A1



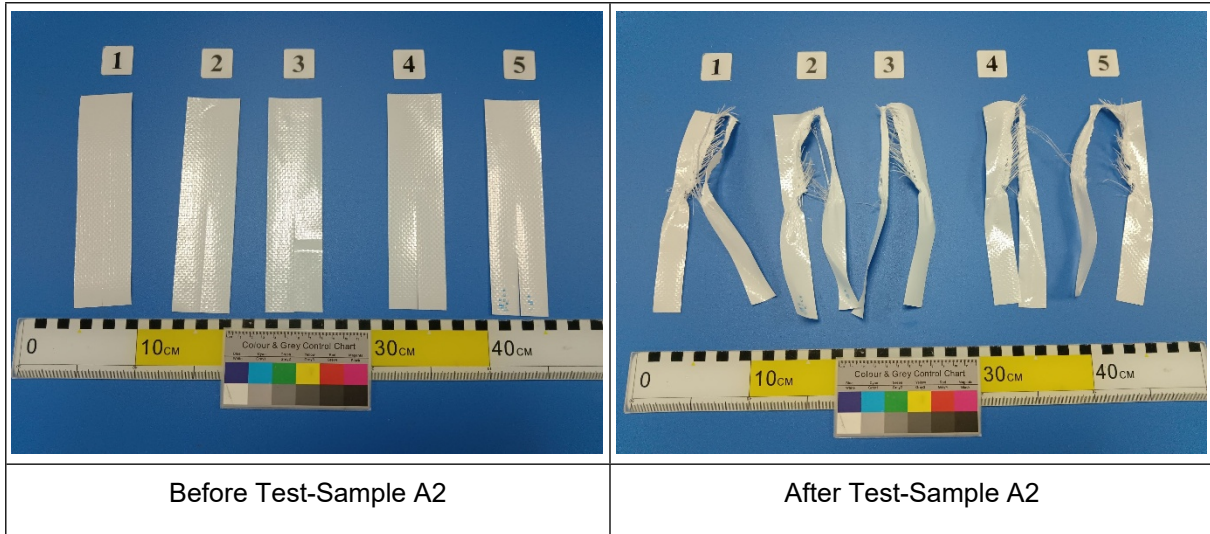
Original Sample-Sample A2

TEST REPORT

No.: SZIN2607002034PL01_EN

Issue Date: 2026-08-10

Page: 13 of 16



Equipment Information:

Equipment Name	Model	Equipment No.	Calibration date	Next Calibration date
Universal Testing Machine	Z030	GZMR-PL-E140	2026-03-25	2027-03-24



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 and such sample(s) are retained for 30 days only.

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

Room 101-501, Plant 4 & Room 101, Plant 2 & Room 101, Plant 3 & Room 301-501, Plant 3, Jianghao (Bantian) Industrial Plant Area, No. 430, Jihua Road, Bantian Community, Bantian Street, Longgang District, Shenzhen, Guangdong, China 518129 www.sgs.com.cn
中国·广东·深圳市龙岗区坂田街道坂田社区吉华路430号江灏(坂田)工业厂区厂房4号101-901、2号101、3号101、3号301-501 邮编:518129 t:(86-755) 25328673 sgs.china@sgs.com

TEST REPORT

No.: SZIN2607002034PL01_EN

Issue Date: 2026-08-10

Page: 14 of 16

5. Test Item: T-Peel Test

Sample Description: A1-Finished product

Test Method: ISO 11339:2022

Lab Environmental Condition: (23 ± 2) °C, (50 ± 5) %RH

Test Condition:

Specimen Width: 25mm

Test Speed: 10mm/min

Test Result:

Sample A1-X direction

Test Item	Maximum Peeling Force, N/100mm	Average Peeling Force, N/100mm	Minimum Peeling Force, N/100mm
Test Result	3.29(See table 1)	2.46	1.78(See table 1)

Notes: Test specimens were cut from the sample.

Table 1:

Specimen	1	2	3	4	5
Maximum Peeling Force, N/100mm	3.238	2.970	2.757	2.948	4.533
Minimum Peeling Force, N/100mm	1.754	2.006	1.579	2.160	1.390

TEST REPORT

No.: SZIN2607002034PL01_EN

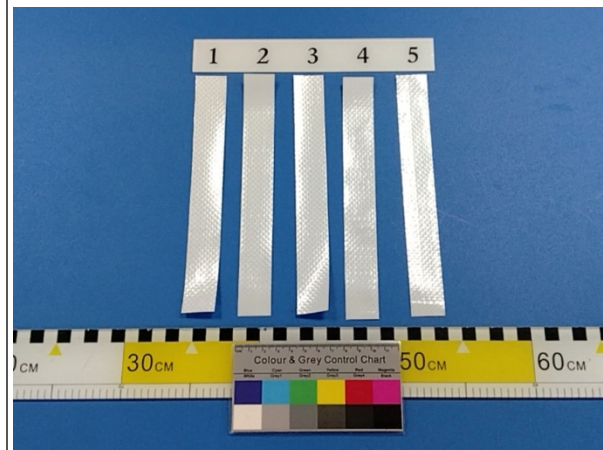
Issue Date: 2026-08-10

Page: 15 of 16

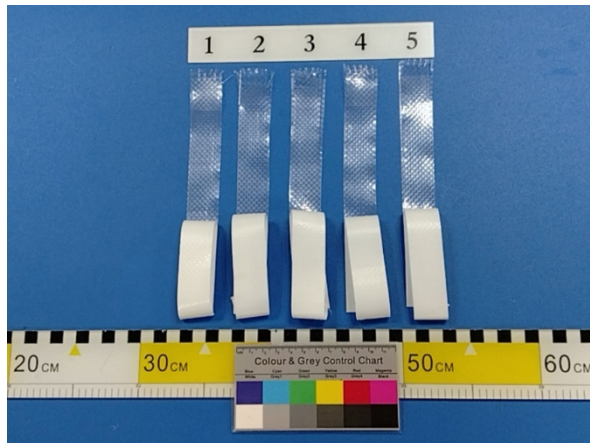
Test Photo:



Original Sample-Sample A1



Before Test-Sample A1



After Test-Sample A1

Equipment Information:

Equipment Name	Model	Equipment No.	Calibration date	Next Calibration date
Universal testing machine	Z1.0	GZMR-PL-E340	2025-09-03	2026-09-02



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 and such sample(s) are retained for 30 days only.

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

Room 101-501, Plant 4 & Room 101, Plant 2 & Room 101, Plant 3 & Room 301-501, Plant 3, Jiangshao (Bantian) Industrial Plant Area, No. 430, Jihua Road, Bantian Community, Bantian Street, Longgang District, Shenzhen, Guangdong, China 518129 www.sgs.com
 中国·广东·深圳市龙岗区坂田街道坂田社区吉华路430号江灏(坂田)工业区厂房4号101-901、2号101、3号101、3号301-501 邮编:518129 t:(86-755) 25328673 sgs.china@sgs.com

TEST REPORT

No.: SZIN2607002034PL01_EN

Issue Date: 2026-08-10

Page: 16 of 16

6. Test Item: Water Resistance (Hydrostatic Head)

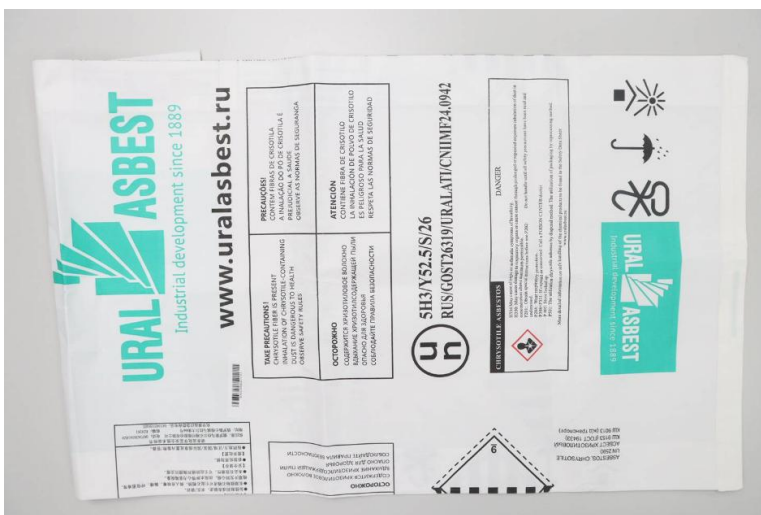
(ISO 811:2018; Hydrostatic Head; Rate of increase of water pressure: 10 cmH₂O/min, temp. of water: 20°C, Face Side Facing Water)

A

As Received	No. 1	No. 2	No. 3	No. 4	No. 5	Average	Requirement
Water Column(mmH ₂ O)	3410	3330	3940	3740	3880	3660	-

Note: This test project/method was carried out by other laboratory in SGS group.

Sample Photo



Appendix information:

1. The above test projects/methods were carried out by other laboratory in SGS group.
2. The test report shall only be used for clients' scientific research, teaching, internal quality control, product research and development, etc... and just for internal reference.
3. Unless otherwise stated, this report provides a declaration of conformity according to whether the test results are within the specified limits or specifications without considering the measurement uncertainty.

*****End of report*****