Suzhou TRYBA Building Materials Technology Co., Ltd.

TEST REPORT

SCOPE OF WORK
105 Vinyl Sliding Window

REPORT NUMBER
260303003SHF-001

TEST DATE(S)
2026-03-10 - 2026-03-11

ORIGINAL ISSUE DATE
2026-03-20

PAGES
19

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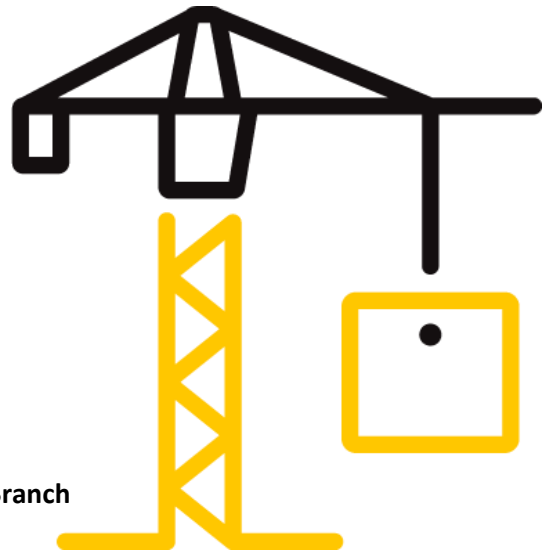

Intertek Testing Services Shenzhen Ltd. Shanghai Fengxian Branch

Test Report

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Test Report

Original Issue Date:	2026-03-20	Intertek Report No.	260303003SHF-001

Applicant:	Suzhou TRYBA Building Materials Technology Co., Ltd.
Applicant Address:	36th floor, Jinhe International Building, 35 Shishan Road, Huqiu District, Suzhou City
Attn:	Alisa
Manufacturer:	TRYBA (Shanghai) Window Co., Ltd.
Manufacturer Address:	No.38, Mingye Road, Sheshan Industrial Park, Songjiang District, Shanghai
Product Type:	Horizontal Sliding Window
Product Model:	105
Primary product designator:	Class LC - PG40 - Size Tested 1800 × 1400 mm (70.87 × 55.12 in.) - HS
Optional secondary designator:	Positive Design Pressure = +1920 Pa (40.10 psf) Negative Design Pressure = -1920 Pa (40.10 psf) Water penetration resistance test pressure = 360 Pa (7.52 psf)
SUBJECT:	Performance testing

Product Information

Product Name	Model	Specification
105 Vinyl Sliding Window	105	1800mm(Width) x 1400mm(Height)
Sample ID	**Sample Amount**	**Sample Received Date**
S260303003SHF.001	1 Set	2026-03-03
Brand	**Sample Description**	
TRYBA	The sample was a completely assembled, glazed, functional product (including hardware) and fully operable, fitted in the test apparatus in accordance with documented instructions.	

Test Methods And Standards

Test Standard	ASTM E283/E283M-2019; ASTM E547-00(R2016); ASTM E330/E330M-2014(R2021); ASTM F588-17(R2023); AAMA/WDMA/CSA101/I.S.2/A440-22 Clause 8.3.1, Clause 8.3.5 and Clause 8.3.6.2
Specification Standard	AAMA/WDMA/CSA 101/I.S.2/A440-22 (NAFS 2022 - North American Fenestration Standard / Specification for Windows, Doors and Skylights) Clause 8.3.1, Clause 8.3.2, Clause 8.3.3, Clause 8.3.4, Clause 8.3.5 and Clause 8.3.6.2; CSA A440S1-25 Canadian Supplement to AAMA/WDMA/CSA 101/I.S.2/A440-22 Clause 5.3 and Clause 5.4
Test Conclusion	The results met AAMA/WDMA/CSA 101/I.S.2/A440-22 and CSA A440S1-25 requirements specified on Horizontal Sliding Window, and the results were shown in the following page.

Note:
1. This report does not involve sampling. The report only reflects conformity of the tested items of the samples provided by the testing applicant. Representativeness and authenticity of the submitted samples are responsibilities of the testing applicant.
2. This test item was conducted in one of our multi-sites address of Plant 3-5, No. 6978 Daye Road, Fengxian District, Shanghai (No. 4-South Plant, No. 161 Litai Road).

Report Authorized

Name: Gio Liu
Title: Reviewer

Name: John Zhang
Title: Project Engineer

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Test Items, Method and Results：

2 Test Result

Table 2 Test Result

Test Description	*Requirements (Class LC-PG40)*		*Results*		*Verdict*
2026/3/10					
Operating Force Test AAMA/WDMA/CSA 101/I.S.2/A440-22, Clause 8.3.1	Maximum force to initiate motion	155 N	Maximum force to initiate motion	92 N	Pass
	Maximum force to maintain motion	155 N	Maximum force to maintain motion	64 N	
	Maximum force to engage latches for Close sash	100 N	Maximum force to engage latches for Close sash	19 N	
Air Leakage Resistance Test AAMA/WDMA/CSA 101/I.S.2/A440-22, Clause 8.3.2 ASTM E283/E283M-2019	Maximum air leakage at+75 Pa	1.5 $L/s \cdot m^2$	Air leakage at +75 Pa	0.16 $L/s \cdot m^2$	Pass
	Maximum air leakage at-75 Pa	1.5 $L/s \cdot m^2$	Air leakage at -75 Pa	0.13 $L/s \cdot m^2$	
Water Penetration Resistance Test AAMA/WDMA/CSA 101/I.S.2/A440-22, Clause 8.3.3 ASTM E547-00 (R2016)	Minimum water pressure	290 Pa	Test Pressure	360 Pa	Pass
			After water sprayed for four cycles in 24 minutes at 360 Pa, no water penetration was observed.		
Uniform Load Deflection Test AAMA/WDMA/CSA 101/I.S.2/A440-22, Clause 8.3.4.2 ASTM E330/E330M-2014(R2021)	Minimum Design Pressure (DP)	1920 Pa	Design Pressure (DP)	+1920 Pa	Reported
			Maximum deflection at Stile	2.4 mm	
			Maximum deflection at Mullion	11.4 mm	
			Design Pressure (DP)	-1920 Pa	
			Maximum deflection at Stile	2.1 mm	
			Maximum deflection at Mullion	12.3 mm	

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Table 2 Test Result (Continued)

Test Description	*Requirements (Class LC-PG40)*		*Results*		*Verdict*
2026/3/10					
Uniform Load Structural Test AAMA/WDMA/CSA 101/I.S.2/A440-22, Clause 8.3.4.3 ASTM E330/E330M-2014 (R2021)	Minimum Structural Pressure (STP)	2880 Pa	Structural Pressure (STP)	+2880 Pa	Pass
			No significant breakage or damage after ultimate strength was released.		
			Maximum permanent deformation at Stile	0.4 mm	
			Maximum permanent deformation at Mullion	0.7 mm	
			Structural Pressure (STP)	-2880 Pa	
			No significant breakage or damage after ultimate strength was released.		
			Maximum permanent deformation at Stile	0.5 mm	
			Maximum permanent deformation at Mullion	0.9 mm	
2026/3/11					
Forced-entry Resistance Test AAMA/WDMA/CSA 101/I.S.2/A440-22, Clause 8.3.5 ASTM F588-17	Minimum Grade 10		Test Class	Grade 10	Pass
			During the test and upon removal of loads, all locking devices were remained engaged and could not entry.		
Deglazing Test AAMA/WDMA/CSA 101/I.S.2/A440-22, Clause 8.3.6.2	Load for vertical sash members	320 N	After test, the sample does not be damaged in any way that would inhibit normal operation and there was no glazing breakage.		Pass
	Load for other members	230 N			

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Appendix B: Test Data

B.1 Air Leakage Resistance Test – Test method ASTM E283/E283M-2019

Overall Area: 2.52 m^2

Infiltration rate (75 Pa)	0.16 $L/s \cdot m^2$	0.03 cfm/ft^2
Exfiltration rate (75 Pa)	0.13 $L/s \cdot m^2$	0.03 cfm/ft^2
Requirements (75 Pa): Maximum allowable leakage for Class LC Windows	1.5 $L/s \cdot m^2$	0.3 cfm/ft^2

The tested specimen met the requirements for Class LC Windows for Air Leakage Resistance Test as per AAMA/WDMA/CSA 101/I.S.2/A440-22.

Appendix B: Test Data

B.2 Water resistance test – Test method ASTM E547-00(R2016)

No water penetration occurred when the pressure was 360 Pa (7.52 psf).
After water sprayed for four cycles in 24 minutes at 360 Pa, no water penetration was observed.

Test result: P_{max} = 360 Pa (7.52 psf).

The tested specimen met the requirements for Class LC-PG40 for Water Penetration Resistance Test as per AAMA/WDMA/CSA 101/I.S.2/A440-22.

Appendix B: Test Data

B.3 Uniform Load Deflection Test – Test method ASTM E330/E330M-2014(R2021), Procedure A

Span length, L = 1290 mm Set Points (1-3)
Span length, L = 1290 mm Set Points (4-6)

Test Pressure (DP), P = 1920 Pa (40.10 psf)

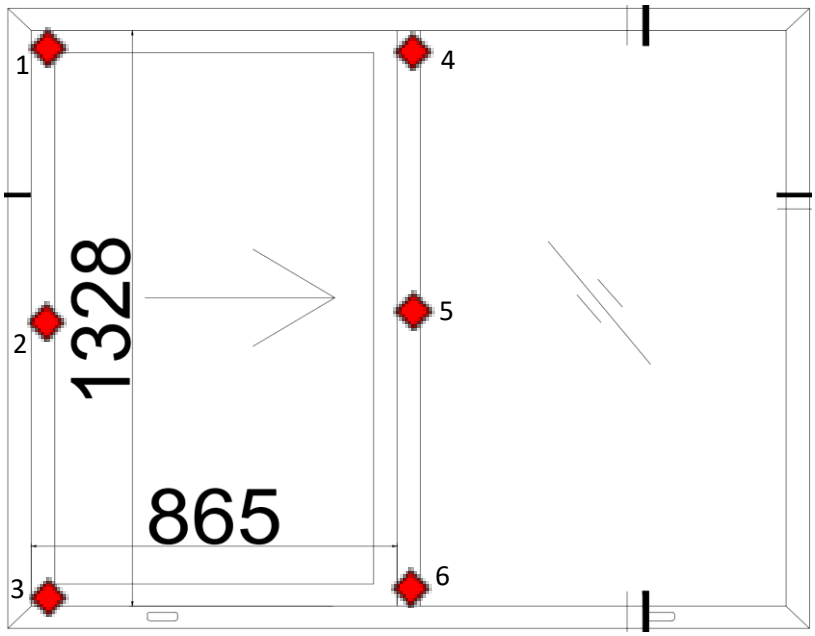

Fig.7 Locations of Displacement Measuring Devices

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Table B.2 Test Data of Uniform Load Deflection Test

Member (mm)		Test Pressure (Pa)	Deflection (mm)			Maximum Deflection(mm)
Item	Span Length		1	2	3	
Stile	1290	+P = 1920	0.7	3.0	0.5	2.4
		0	<0.1	0.3	0.1	0.3
		-P = -1920	1.1	2.9	0.5	2.1
		0	<0.1	0.4	0.1	0.4
Member (mm)		Test Pressure (Pa)	Deflection (mm)			Maximum Deflection(mm)
Item	Span Length		4	5	6	
Mullion	1290	+P = 1920	1.7	13.0	1.6	11.4
		0	0.1	0.6	0.1	0.5
		-P = -1920	1.9	14.1	1.7	12.3
		0	0.1	0.8	0.2	0.7

Table B.3 Test Data of Uniform Load Deflection Test for Stile

Test Pressure	Deflection Measurements, mm (in.)			
	Positive		Negative	
	Maximum Deflection		Maximum Deflection	
1920 Pa (40.10 psf)	2.4	(0.09)	2.1	(0.08)
Span length, L = 1290 mm (50.79 in.)	Deflection limit: reported			

Table B.4 Test Data of Uniform Load Deflection Test for Mullion

Test Pressure	Deflection Measurements, mm (in.)			
	Positive		Negative	
	Maximum Deflection		Maximum Deflection	
1920 Pa (40.10 psf)	11.4	(0.45)	12.3	(0.48)
Span length, L = 1290 mm (50.79 in.)	Deflection limit: reported			

The tested specimen met the requirements for Class LC-PG40 for Uniform Load deflection Test at Design Pressure as per AAMA/WDMA/CSA 101/I.S.2/A440-22.

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Appendix B: Test Data

B.4 Uniform Load Structrual Test – Test method ASTM E330/E330M-2014(R2021), Procedure A

Design Pressure, P = 1920 Pa (40.10 psf)

Structural Pressure, P = 2880 Pa (60.15 psf)

Table B.5 Test Data of Uniform Load Structural Test

Member (mm)		Test Pressure (Pa)	Permanent deformation(mm)			Maximum permanent deformation(mm)
Item	Span Length		1	2	3	
Stile	1290	+P = 2880	–	–	–	–
		0	<0.1	0.4	0.1	0.4
		-P = -2880	–	–	–	–
		0	<0.1	0.5	0.1	0.5
Permanent Deformation limit, L x 0.4% = 5.2 mm						
Member (mm)		Test Pressure (Pa)	Permanent deformation(mm)			Maximum permanent deformation(mm)
Item	Span Length		4	5	6	
Mullion	1290	+P = 2880	–	–	–	–
		0	0.1	0.8	0.2	0.7
		-P = -2880	–	–	–	–
		0	0.3	1.2	0.3	0.9
Permanent Deformation limit, L x 0.4% = 5.2 mm						

Table B.6 Test Data of Uniform Load Structural Test For Stile

Test Pressure	Deflection Measurements, mm (in.)			
	Positive		Negative	
	Perm. Set		Perm. Set	
2880 Pa (60.15 psf)	0.4	(0.02)	0.5	(0.02)

Table B.7 Test Data of Uniform Load Structural Test For Mullion

Test Pressure	Deflection Measurements, mm (in.)			
	Positive		Negative	
	Perm. Set		Perm. Set	
2880 Pa (60.15 psf)	0.7	(0.03)	0.9	(0.04)

After the test loads were released, there was no failure or permanent deformation of any part of the window system that would cause the test specimen to be inoperable. There was no permanent deformation which was in excess of 0.4% of its span.

The tested specimen met the requirements for Class LC-PG40 for Uniform Load Structure Test at Structural Pressure as per AAMA/WDMA/CSA 101/I.S.2/A440-22.

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Appendix C: Sample Received Photo

Revision:

NO.	Date	Changes
260303003SHF-001	2026-03-20	First issue