

通标标准技术服务（上海）有限公司

SGS-CSTC Standards Technical Services (Shanghai) Co., Ltd.

窗检测报告

Window Test Report

委托单位: 良木道门窗集团有限公司

Entrusting unit: Leawod Windows & Doors Group Co., Ltd

检测项目: 挠度、气密性能、水密性能、极限强度

Test items: Deflection、Air tightness、Water tightness、Ultimate strength

检测依据: AS 2047-2014、AS-NZS 4420.1-2016

Basis for detection:

报告日期: 2025.10.11

Report date: October 11, 2025

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SHCME 022836

窗物理性能检测报告

Window Physical Performance Testing Report

委托单位 Entrusting unit	良木道门窗集团有限公司 Leawod Windows & Doors Group Co., Ltd	检测类别 Detection category	定级检测 Grading testing
厂家地址 Manufacturer's address	四川省德阳市广汉市湘潭路九段3号 No.3, section 9, Xiangtan Road, Guanghan City, Deyang, Sichuan, China	委托日期 The date of the commission	2025.9.23
		检测日期 Date of Testing	2025.9.26
样品名称及 产品规格 Sample name and product specification	GPN70X-AU 固定窗 GPN70X-AU Fixed Window 2000 mm (W) *2400 mm (H) *70mm(T)	委托编号 Order number	GZIN2509003692 PL01-2
		样品编号 Sample number	NJG202509077-2
玻璃最大尺寸 Maximum size of glass	宽 930mm, 高 2310mm, 厚 30mm Width 930mm, Height 2310mm, Thickness 30mm	检测数量 Number of detections	1
开启缝长 The length of the opening seam	/	试件面积 Specimen area	4.80 m ²
受力杆长 The stress rod is long	2380 mm	变形检测允许最大挠度 L/250 The maximum deflection detection is allowed at L/250	9.52 mm
玻璃种类/结构 Types/Structures of Glass	中空钢化玻璃 Tempered Insulating Glass (5+20Ar+5) mm	型材类型 Type of profile	铝合金隔热型材 6063-T5 Aluminum alloy thermal insulation profiles
玻璃密封材料 Glass sealing material	硅酮耐候密封胶 Silicone weathering sealant	框扇密封材料 Frame fan sealing material	/



检测项目 Test items	设计要求 Design requirements	检测结果 Test results	等级评定 Ratings
挠度 Deflection	$P_{1+} = 2.0 \text{ kPa}$	变形挠度 1.49mm Deformable deflection 1.49mm	General C4
	$P_{1-} = 2.0 \text{ kPa}$	变形挠度 4.31mm Deformable deflection 4.31mm	
气密性 Air tightness	75Pa 压差下窗整体单位面积空气渗透量 Air penetration per unit area of the window under a pressure difference of 75Pa	$+q_A = 0.05 \text{ L/s}\cdot\text{m}^2$	Low
		$-q_A = 0.06 \text{ L/s}\cdot\text{m}^2$	
	平均渗漏量 Average leakage	$0.06 \text{ L/s}\cdot\text{m}^2$	
水密性能 Water tightness	静态压力 800Pa Static pressure 800Pa	未发生渗漏 No Leakage	Exposed N6,C4
极限强度 Ultimate strength	$P_{3+} = 4.6 \text{ kPa}$	正常且测试样品未出现功能性障碍或损坏 No functionally obstacle or damage occurs.	General C3
	$P_{3-} = 4.6 \text{ kPa}$		
检测设备 Testing equipment	门窗物理性能检测系统 DW-63 Door and window physical performance testing system DW-63		
检测地址 Test address	上海市浦东新区康桥东路 1159 弄 69 号 11 号楼 Building 11, No. 69, Lane 1159, Kangqiao East Road, Pudong New Area, Shanghai		

批准 Approved: 张 审核 Check: 李 检测 Test: 李



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附录 测试记录图
Appendix Test record diagram
挠度 Deflection



备注
Remarks

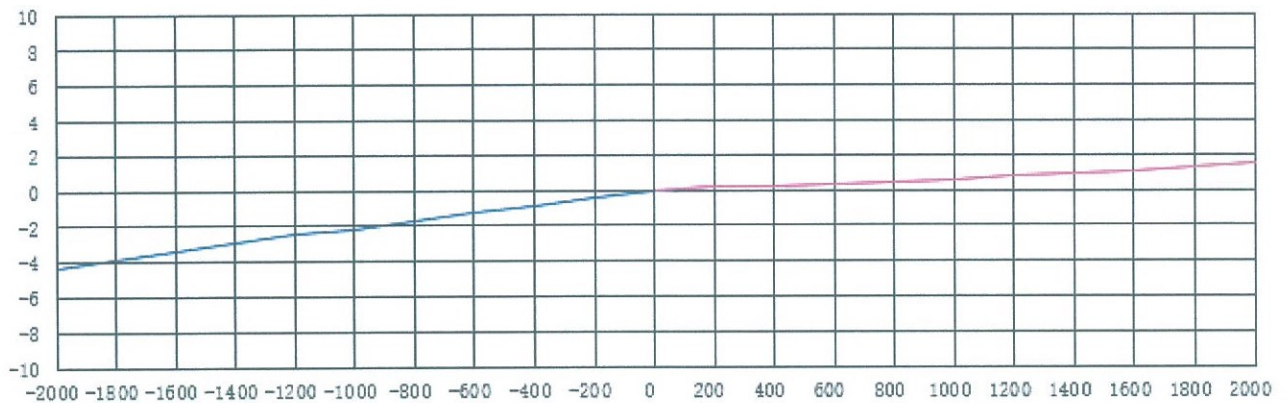
挠度测试未出现功能障碍和损坏
The deflection test showed no dysfunction or damage

压力差与挠度关系图

Graph of the relationship between pressure difference and deflection

Positive data collection					Negative data collection				
Pressure difference (Pa)	Deformation value (mm)			Surface normal deflection (mm)	Pressure difference (Pa)	Deformation value (mm)			Surface normal deflection (mm)
	A	B	C			A	B	C	
0	0	0	0	0	0	0	0	0	0.00
200	0.03	0.14	0.02	0.12	-200	-0.23	-0.73	-0.31	-0.46
400	0.13	0.32	0.07	0.22	-400	-0.54	-1.42	-0.61	-0.84
600	0.28	0.54	0.13	0.34	-600	-0.81	-2.15	-0.93	-1.28
800	0.42	0.74	0.21	0.42	-800	-1.00	-2.84	-1.25	-1.72
1000	0.56	1.01	0.30	0.58	-1000	-1.29	-3.59	-1.55	-2.17
1200	0.72	1.27	0.39	0.72	-1200	-1.68	-4.28	-1.93	-2.48
1400	0.87	1.55	0.47	0.88	-1400	-2.03	-5.03	-2.22	-2.90
1600	1.04	1.86	0.55	1.06	-1600	-2.31	-5.81	-2.52	-3.39
1800	1.21	2.20	0.65	1.27	-1800	-2.65	-6.61	-2.87	-3.85
2000	1.36	2.54	0.74	1.49	-2000	-2.93	-7.38	-3.21	-4.31

Stress deflection curve



气密性

Air tightness



检测室气温

Temperature of detection
room

25 °C

检测室气压

Detection chamber pressure

101.9 kPa

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水密性

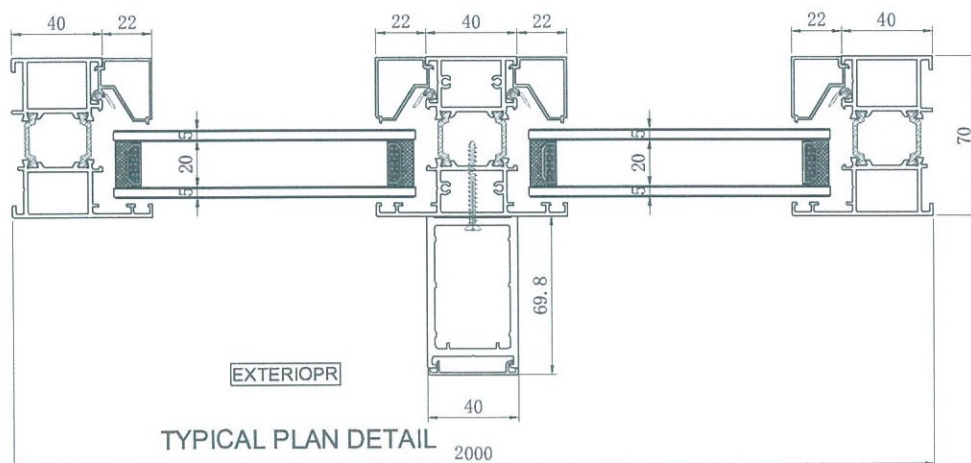
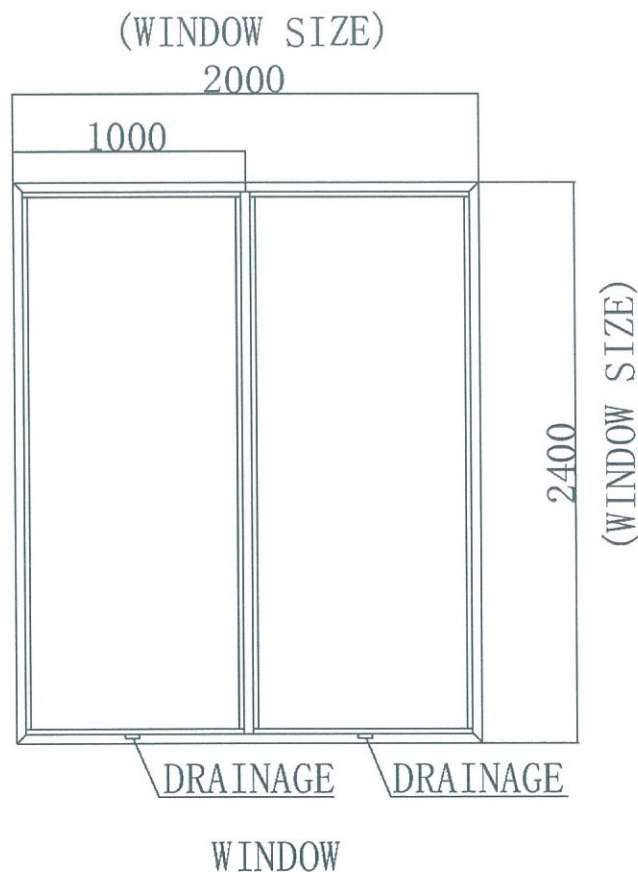
Water tightness

备注
Remarks

水流量为 $0.05 \text{ L/m}^2 \cdot \text{s}$, 开始测试前测试压力为 0 Pa 时淋水 5 min , 随后每级淋水 15 min
The water flow rate is $0.05 \text{ L/m}^2 \cdot \text{s}$, Before starting the test, the test pressure is 0 Pa and
water is sprayed for 5 min , followed by 15 min for each stage

窗立面图、节点图

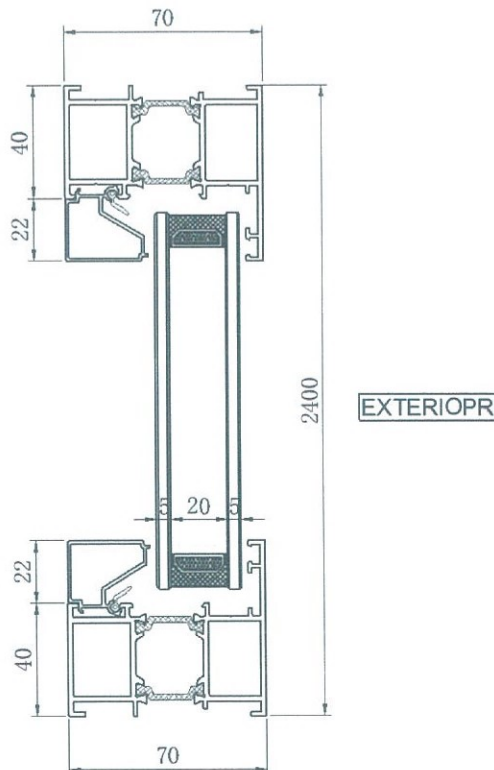
Window elevation drawing and node drawing



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